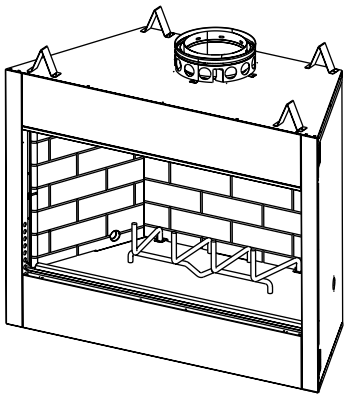
HEAT&GLO™

No one builds a better fire

Owner's Manual

Installation and Operation

Models:
RH-36 Series
RH-42 Series
Wood Burning Fireplace



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NOTICE

DO NOT DISCARD

DO NOT DISCARD THIS MANUAL

- Important operating and maintenance instructions included.
- Read, understand and follow these instructions for safe installation and operation.
- Leave this manual with party responsible for use and operation.

⚠ WARNING

If the information in these instructions is not followed exactly, a fire may result causing property damage, personal injury, or death.

- Do not store or use gasoline or other flammable vapors and liquids in the vicinity of this or any other appliance.
- Do not overfire. Overfiring will void your warranty.
- Comply with all minimum clearances to combustibles as specified. Failure to comply may cause house fire.

⚠ WARNING

HOT SURFACES!

Screen/mesh, glass doors and other surfaces are hot during operation AND cool down.

Hot screen/mesh and glass doors will cause burns.

- **DO NOT** touch screen/mesh or glass doors until cooled
- NEVER allow children to touch screen/mesh or glass doors
- Keep children away
- CAREFULLY SUPERVISE children in same room as fireplace.
- Alert children and adults to hazards of high temperatures.

High temperatures may ignite clothing or other flammable materials.

- Keep clothing, furniture, draperies and other flammable materials away.

Installation and service of this fireplace should be performed by qualified personnel. Hearth & Home Technologies suggests NFI certified or factory-trained professionals, or technicians supervised by an NFI certified professional.

Wood Energy Technical Training

⚠ WARNING

Fire Risk

- For use with solid wood fuel or decorative gas appliance only.
- **DO NOT** install unvented gas logs.

Read this manual before installing or operating this fireplace.
Please retain this owner's manual for future reference.

Congratulations!

Congratulations on selecting a Heat & Glo wood burning fireplace. The Heat & Glo fireplace you have selected is designed to provide the utmost in safety, reliability and efficiency.

As the owner of a new fireplace, you'll want to read and carefully follow all of the instructions contained in this owner's manual. Pay special attention to all cautions and warnings.

This owner's manual should be retained for future reference. We suggest you keep it with your other important documents and product manuals.

The information contained in this owner's manual unless noted otherwise, applies to all models and gas control systems.

Your new Heat & Glo wood burning fireplace will give you years of durable use and trouble-free enjoyment. Welcome to the Heat & Glo family of fireplace products!

Homeowner Reference Information

We recommend that you record the following pertinent information about your fireplace:

Model Name: _____ Date purchased/installed: _____

Serial Number: _____ Location on fireplace: _____

Dealership purchased from: _____ Dealer phone: _____

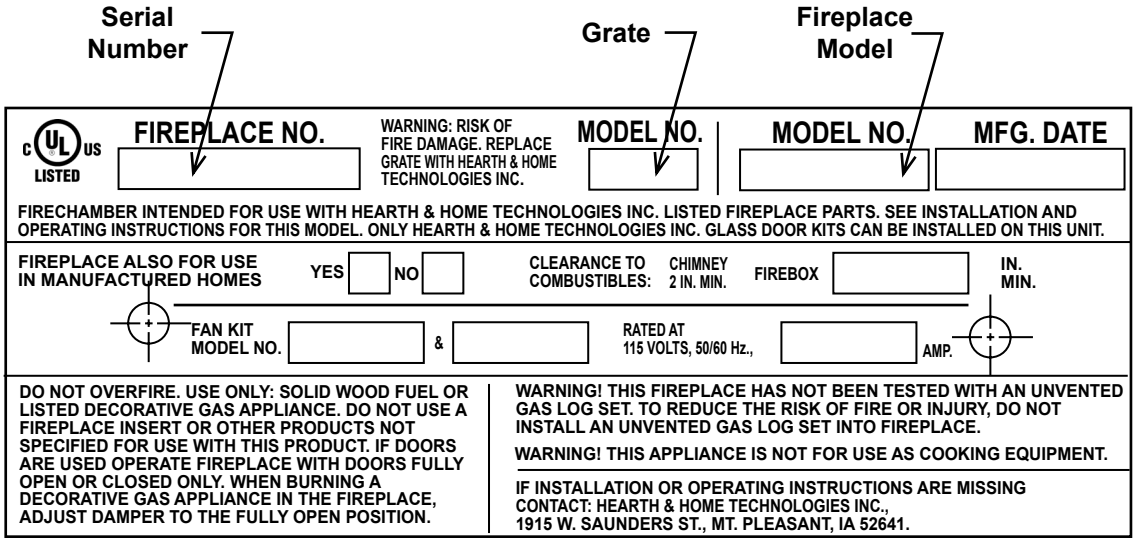
Notes: _____

_____

_____

Listing Label Information/Location

The model information regarding your specific fireplace can be found on the rating plate located on the smoke shield of the fireplace.


Serial Number
Grate
Fireplace Model
c UL us LISTED
FIREPLACE NO.
WARNING: RISK OF FIRE DAMAGE. REPLACE GRATE WITH HEARTH & HOME TECHNOLOGIES INC.
MODEL NO.
MODEL NO.
MFG. DATE
FIRECHAMBER INTENDED FOR USE WITH HEARTH & HOME TECHNOLOGIES INC. LISTED FIREPLACE PARTS. SEE INSTALLATION AND OPERATING INSTRUCTIONS FOR THIS MODEL. ONLY HEARTH & HOME TECHNOLOGIES INC. GLASS DOOR KITS CAN BE INSTALLED ON THIS UNIT.
FIREPLACE ALSO FOR USE IN MANUFACTURED HOMES
YES
NO
CLEARANCE TO COMBUSTIBLES:
CHIMNEY 2 IN. MIN.
FIREBOX
IN. MIN.
FAN KIT MODEL NO.
&
RATED AT 115 VOLTS, 50/60 Hz.,
AMP.
DO NOT OVERFIRE. USE ONLY: SOLID WOOD FUEL OR LISTED DECORATIVE GAS APPLIANCE. DO NOT USE A FIREPLACE INSERT OR OTHER PRODUCTS NOT SPECIFIED FOR USE WITH THIS PRODUCT. IF DOORS ARE USED OPERATE FIREPLACE WITH DOORS FULLY OPEN OR CLOSED ONLY. WHEN BURNING A DECORATIVE GAS APPLIANCE IN THE FIREPLACE, ADJUST DAMPER TO THE FULLY OPEN POSITION.
WARNING! THIS FIREPLACE HAS NOT BEEN TESTED WITH AN UNVENTED GAS LOG SET. TO REDUCE THE RISK OF FIRE OR INJURY, DO NOT INSTALL AN UNVENTED GAS LOG SET INTO FIREPLACE.
WARNING! THIS APPLIANCE IS NOT FOR USE AS COOKING EQUIPMENT.
IF INSTALLATION OR OPERATING INSTRUCTIONS ARE MISSING CONTACT: HEARTH & HOME TECHNOLOGIES INC., 1915 W. SAUNDERS ST., MT. PLEASANT, IA 52641.

Note: An arrow (➔) found in the text signifies change in content.

⚠ Safety Alert Key:

- ***DANGER!*** Indicates a hazardous situation which, if not avoided will result in death or serious injury.
- ***WARNING!*** Indicates a hazardous situation which, if not avoided could result in death or serious injury.
- ***CAUTION!*** Indicates a hazardous situation which, if not avoided, could result in minor or moderate injury.
- ***NOTICE:*** Indicates practices which may cause damage to the fireplace or to property.

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➔ Warranty

Hearth & Home Technologies LIMITED WARRANTY

Hearth & Home Technologies (“HHT”) and its respective brands extends the following warranty for HHT gas, wood, pellet and electric appliances purchased from an authorized HHT dealer and installed in the United States of America or Canada. Warranty starts with date of purchase by the original owner (End User) except as noted for replacement parts.

Warranty Period		HHT Manufactured Appliances and Venting						Components Covered
Parts	Labor	Gas	Wood	Pellet	EPA Wood	Electric	Venting	
1 Year		X	X	X	X	X	X	All Parts and Material Except as covered by Conditions, Exclusion, and Limitations listed
2 years				X	X			Igniters, Electronic Components, and Glass
		X	X	X	X			Blowers
			X					Molded Refractory Panels
3 years				X				Firepots
5 years	3 years			X	X			Castings & Baf?es
7 years	3 years		X	X	X			Firebox, HHT Chimney, Termination & Heat Exchanger
10 years	1 year	X						Burners, Logs & Refractory
Limited Lifetime	1 year	X						Firebox & Heat Exchanger
90 Days		X	X	X	X	X	X	All Replacement Parts
See Conditions, Exclusions, and limitations. 9-01-08								

CONDITIONS, EXCLUSIONS & LIMITATION OF LIABILITY

- This warranty applies to the original owner and is transferable up to two years from date of purchase to the new homeowner, provided the purchase was made through an authorized dealer or distributor of HHT, and the appliance remains in its original place of installation.
- The maximum amount recoverable under this warranty is limited to the purchase price of the product.
- In no event shall HHT be liable for any incidental or consequential damages caused by defects in the product.
- Adjustments, regular maintenance, cleaning and temporary repairs, or the failure to duplicate the problem in the home is not covered under this warranty.

This limited warranty does not extend to or include surface ?nish on the appliance or terminations, door gasketing, glass gasketing, glass discoloration, ?rebrick, pellet logs, kaowool or other ceramic insulating materials. Rust and/or corrosion on any of the metal surfaces, cast iron components, baf?es, ?repots, doors, or ?rebox area are not covered by this warranty.

- Noise resulting from minor expansion, contraction, or movement of certain parts is normal and complaints related to this noise are not covered by this warranty.
- HHT's obligation under this warranty does not extend to damages resulting from: (1) installation, operation or maintenance of the appliance not in accordance with the installation instructions; operating instructions and the listing agent identi?cation label furnished with the appliance; (2) installation which does not comply with local building codes; (3) shipping, improper handling, improper operation, abuse, misuse, accident or unworkmanlike repairs; (4) environmental conditions, inadequate ventilation or drafting caused by tight sealing construction of the structure or handling devices such as exhaust fans or forced air furnaces or other such causes; (5) use of fuels other than those speci?ed in the operating instructions; (6) installation or use of components not supplied with the appliance or any other components not expressly authorized and approved by HHT; and/or (7) modi?cation of the appliance not expressly authorized and approved by HHT in writing.
- This warranty does not apply to non-HHT venting components, hearth components or other accessories used in conjunction with the installation of this product.
- This warranty is void if the appliance has been over-?red or operated in atmospheres contaminated by chlorine, ?uorine, or other damaging chemicals the appliance is subject to prolonged periods of dampness or condensation, or there is any damage to the appliance or other components due to water or weather damage which is the result of, but not limited to, improper chimney or venting installation.
- HHT's liability under this warranty is limited to the replacement and repair of defective components or workmanship during the applicable period. HHT may fully discharge all of its obligations under such warranties by repairing the defective component(s) at HHT's discretion. Shipping costs are not covered under this warranty.
- Some states do not allow exclusions or limitation of incidental or consequential damages, so those limitations may not apply to you. This warranty gives you speci?c rights; you may also have other rights, which vary from state to state.
- EXCEPT TO THE EXTENT PROVIDED BY LAW, HHT MAKES NO EXPRESS WARRANTIES OTHER THAN THE WARRANTY SPECIFIED HEREIN. THE DURATION OF ANY IMPLIED WARRANTY IS LIMITED TO DURATION OF THE WARRANTY SPECIFIED ABOVE.

This Limited Warranty is effective on all HHT appliances sold after September 01, 2008 and supersedes any and all warranties currently in existence.

If warranty service is needed, you should contact your installing dealer. If the installing dealer is unable to provide necessary parts or components, contact the nearest authorized HHT dealer or supplier.

1 Listing and Code Approvals

A. Appliance Certification

This fireplace system has been tested and listed in accordance with UL 127 and ULC-S610 standards by Underwriters Laboratories Inc. for installation and operation in the United States and Canada.

This fireplace may be installed in sleeping rooms EXCEPT in manufactured homes. If installed with a gas log set, provisions for the National Fuel Gas Code must be met.

This fireplace has been tested and listed for use with the optional components specified in this manual. These optional components may be purchased separately and installed at a later date. Installation of an outside air kit will require significant reconstruction and is best if installed at the time of fireplace installation.

Heat & Glo is a registered trademark of Hearth & Home Technologies Inc.

WARNING! Risk of Fire! *Hearth & Home Technologies disclaims any responsibility for, and the warranty and agency listing will be voided by the following actions.*

DO NOT:

- *install or operate damaged fireplace*
- *modify fireplace*
- *install other than as instructed by Hearth & Home Technologies*
- *operate the fireplace without fully assembling all components*
- *overfire*
- *install an unvented gas log set*
- *install any component not approved by Hearth & Home Technologies*
- *install parts or components not Listed or approved*

Improper installation, adjustment, alteration, service or maintenance can cause injury or property damage. For assistance or additional information, consult a qualified installer, service agency or your dealer.

NOTICE: *This fireplace is tested and approved as a decorative fireplace. It should not be factored as a primary heat source in residential heating calculations.*

B. Non-Combustible Materials

- Materials which will not ignite and burn, composed of any combination of the following:
  - Steel - Iron
  - Brick - Tile
  - Concrete - Slate
  - Glass - Plasters
- Materials reported as passing **ASTM E 136, Standard Test Method for Behavior of Metals, in a Vertical Tube Furnace at 750° C**

C. Combustible Materials

- Materials made of or surfaced with any of the following materials:
  - Wood - Compressed paper
  - Plant fibers - Plastic
- Any material that can ignite and burn; flame proofed or not, plastered or un-plastered

User Guide

2 Operating Instructions

⚠ WARNING

HOT SURFACES!

Glass and other surfaces are hot during operation AND cool down.

Hot glass will cause burns.

- **DO NOT** touch glass until it is cooled
- NEVER allow children to touch glass
- Keep children away
- CAREFULLY SUPERVISE children in same room as fireplace.
- Alert children and adults to hazards of high temperatures.

High temperatures may ignite clothing or other flammable materials.

- Keep clothing, furniture, draperies and other flammable materials away.

If you expect that children may come into contact with this fireplace, we recommend a barrier such as a decorative screen. See your dealer for suggestions.

A. Your Fireplace

***WARNING! DO NOT** operate fireplace before reading and understanding operating instructions. Failure to operate fireplace according to operating instructions could cause fire or injury.*

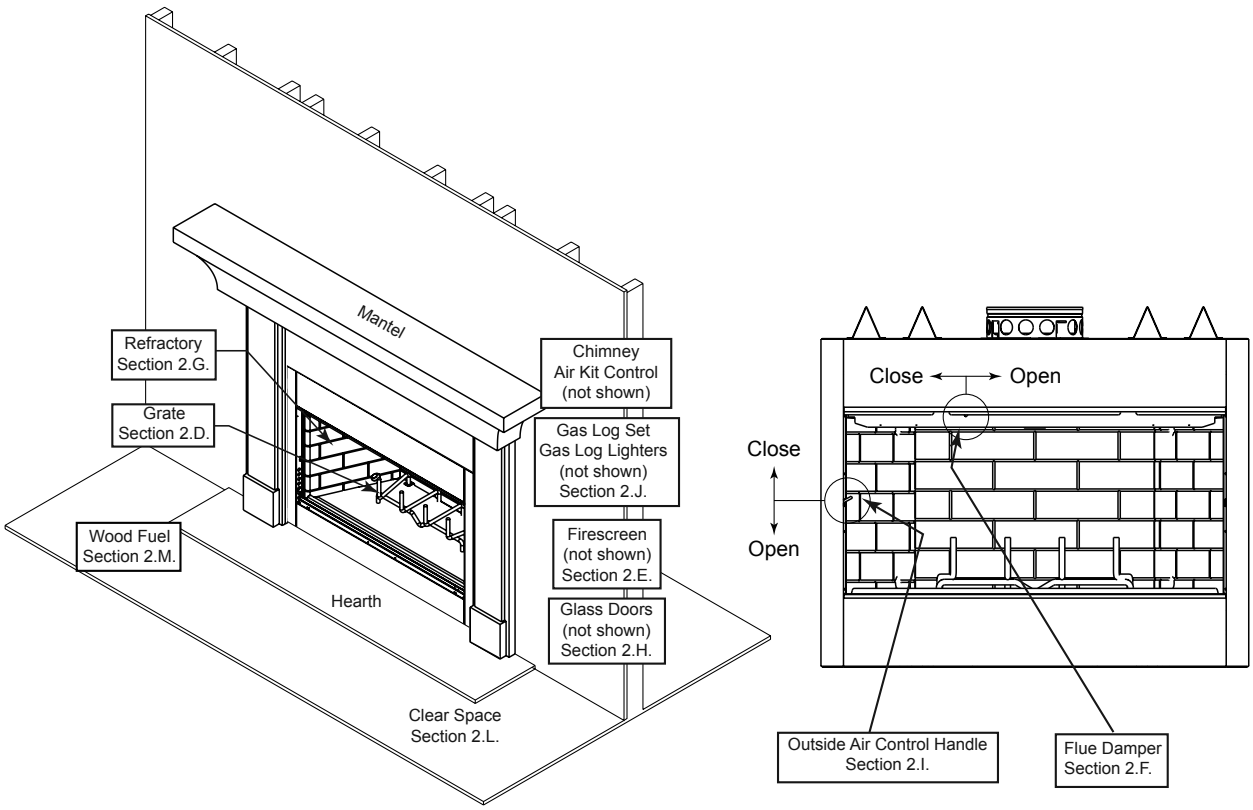


Figure 2.1 General Operating Parts

B. Seasoned Wood

Properly seasoned wood is important for successful operation of your fireplace. Most woodburning fireplace problems are caused by burning wet, unseasoned wood.

Seasoned firewood is wood that is cut to size, split and air dried to a moisture content of around 20%.

Imagine a wooden bucket that weighs about eight pounds. Fill it with a gallon of water, put it in the fireplace and try to burn it. This sounds ridiculous but that is exactly what you are doing if you burn unseasoned wood.

A tree cut down a year ago and not split is likely to have almost as high a moisture content now as it did when it was cut.

Please refer to Section 2.M for more detail.

C. Starting a Fire

NOTICE: *You must establish a good draft to prevent smoke spillage into the room.*

WARNING! Risk of Fire! *Keep combustible materials, gasoline and other flammable vapors and liquids clear of the fireplace.*

DO NOT:

- *store flammable materials close to the fireplace*
- *use gasoline, lantern fuel, kerosene, charcoal lighter fluid or similar liquids to start or "freshen up" a fire in this fireplace.*

Keep all flammable liquids well away from the fireplace while it is in use. Combustible materials may ignite.

- The first three or four fires should be of moderate size to allow the oils and binders to be burned from the fireplace and the refractory and paint to cure. You may notice an industrial odor the first few fires. This is considered normal.
- Use well-seasoned wood.
- Open the flue damper to a fully open position.
- Place crumpled or twisted paper under the fireplace grate.
- Loosely arrange kindling or small pieces of wood to form a 'tent' on the fireplace grate.
- Pre-warm the flue to establish a draft to help reduce smoke spillage during start-up. Hold a rolled up piece of burning newspaper under the flue damper for a few moments.
- Light the crumpled paper to ignite the kindling.
- Add small pieces of wood until a hot bed of embers has been established.
- Add a minimum of three average size pieces of split firewood, placed to allow combustion air and flames between them.

CAUTION! *Odors and vapors released during initial operation may be irritating to sensitive individuals.* ***Open windows for air circulation.***

D. Grate

This fireplace is designed to be used with the grate supplied with this unit or one approved by HHT. The grate will break down over time and will need occasional replacement.

WARNING! Risk of Fire! *Use only the factory-supplied integral grate.*

- *Keeps logs in place.*
- *Allows proper air circulation around the fire.*

E. Firescreen

The firescreen is provided to control sparks. Keep it closed when the fireplace is in use.

WARNING! Risk of Fire or Burns!

- *Screen will not prevent burning materials from falling out.*
- *Screen pulls or handles may be hot.*

F. Flue Damper

- Refer to Figure 2.1 for location of control.
- Must be in fully open position (handle up toward the top of the fireplace) during operation of the fireplace.
- Before lighting the fireplace, verify fully open position by looking up from the inside of the fireplace.

WARNING! Risk of Fire and Asphyxiation! *Open damper prior to operating fireplace. A closed damper overfires the fireplace and spills smoke and flames into the room.*

G. Refractory

- The refractory is supplied to contain heat and provide an attractive interior.
- It will break down over time and will need occasional replacement. Small hairline cracks and discoloration are normal and do not affect its safety.
- (See refractory maintenance Section 3.C.)

WARNING! Risk of Fire! DO NOT *burn fireplace without refractory. Use only refractory supplied by Hearth & Home Technologies, Inc.*

H. Glass Doors

- Glass doors are optional.
- Refer to Figure 2.2 for how to properly use them.

WARNING! Risk of Fire! *Install ONLY doors approved by Hearth & Home Technologies, Inc.*

WARNING! Risk of Fire and Smoke! *Fireplaces equipped with doors should be operated only with doors fully open or doors fully closed. If doors are left partly open, gas and flame may be drawn out of the fireplace opening.*

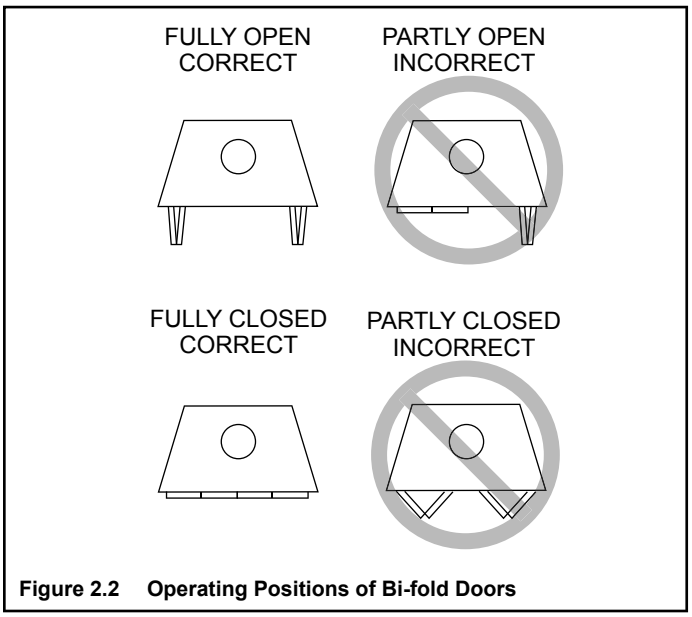


Figure 2.2 Operating Positions of Bi-fold Doors

I. Outside Air (optional)

The outside air kit supplies some combustion air for your fireplace. It may help reduce the effects of negative air pressure. (See Section 5.D.)

- Refer to Figure 2.1 for location of control
- Close the inlet to prevent cold drafts when the fireplace is not being used.

CAUTION! Risk of Burns! *The outside air control handle is HOT when fireplace is in operation. Adjust BEFORE lighting fire.*

J. Vented Gas Log Sets & Gas Log Lighters

- Optional
- Vented gas logs or gas log lighters can be installed in this fireplace. Follow the instructions provided with the accessory for operation.

WARNING! Risk of Fire or Asphyxiation!

- ***DO NOT*** *install unvented gas logs.*
- *Damper must be locked open.*
- *Gas flame may generate fumes.*

K. Optional Components

- Other options may be available
- Consult your dealer/distributor

WARNING! Risk of Fire! DO NOT *install and or use any component not approved by Hearth & Home Technologies Inc.*

L. Clear Space

- Do not place combustible objects within areas indicated in Figure 2.3.

WARNING! DO NOT *place combustible objects in front of the fireplace. High temperatures may ignite clothing, furniture or draperies.*

- Mantel - avoid placing candles and other heat-sensitive objects on mantel or hearth. Heat may damage these objects.

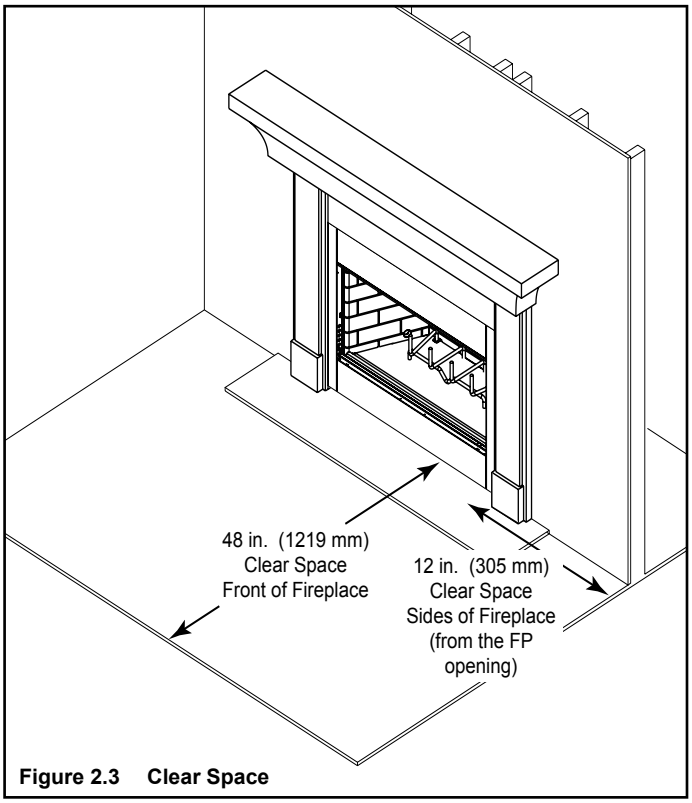


Figure 2.3 Clear Space

M. Wood Fuel

Hardwood vs Softwood

Your fireplace performance depends on the quality of the firewood you use.

- Seasoned wood contains about 8,000 BTUs per pound .
- Hard woods are more dense than soft woods.
- Hard woods contain 60% more BTUs than soft woods.
- Hard woods require more time to season, burn slower and are harder to ignite.
- Soft woods require less time to dry, burn faster and are easier to ignite.
- Start the fire with soft wood to bring the fireplace up to operating temperature and to establish draft.
- Add hard wood for slow, even heat and longer burn time.

Soft woods	Hard woods
• Douglas Fir	• Oak
• Pine	• Maple
• Spruce	• Apple
• Cedar	• Birch
• Poplar	
• Aspen	
• Alder	

Moisture

WARNING! Risk of Fire!

- ***DO NOT*** *burn wet or green wood.*
- *Wet, unseasoned wood can cause accumulation of creosote.*

The majority of the problems fireplace owners experience are caused by trying to burn wet, unseasoned wood.

- Wet, unseasoned wood requires energy to evaporate the water instead of heating your home, and
- Evaporating moisture cools your chimney, accelerating formation of creosote.

Seasoned Wood

- Cut logs to size
- Split to 6 in. (152 mm) or less
- Air dry to a moisture content of around 20%
  - Soft wood - about nine months
  - Hard wood - about eighteen months

NOTICE: *Seasoning time may vary depending on drying conditions.*

Storing Wood

Steps to ensure properly seasoned wood:

- Stack wood to allow air to circulate freely around and through woodpile.
- Elevate wood pile off ground to allow air circulation underneath.
- Smaller pieces of wood dry faster. Any piece over 6 in. (152 mm) in diameter should be split.
- Wood (whole or split) should be stacked so both ends of each peice are exposed to air. More drying occurs through the cut ends than the sides.
- Store wood under cover to prevent water absorbtion from rain or snow. Avoid covering the sides and ends completely.

WARNING! Fire Risk! DO NOT *store wood:*

- *In front of the fireplace.*
- *In space required for loading or ash removal.*

Processed Solid Fuel Firelogs

Manufactured firelogs may be used with this fireplace. Hearth & Home Technologies Inc. recommends the use of UL Classified processed fuel firelogs. Follow the manufacturer's lighting and safety instructions.

Using firelogs may require more frequent chimney inspection and cleaning.

Do not poke or stir the logs while they are burning. Use only firelogs that have been evaluated for the application in manufactured fireplaces and refer to firelog warnings and caution markings on packaging prior to use.

3 Maintainance and Service

A. Disposal of Ashes

Frequency: When they reach bottom of grate
By: Homeowner

WARNING! Risk of Fire! *Ashes could contain hot embers.*

- Place ashes in a metal container with a tight-fitting lid.
- The closed container should be placed on a noncombustible floor or on the ground, well away from all combustible materials, pending final disposal.
- If the ashes are disposed of by burial in soil or otherwise locally dispersed, they should be retained in the closed container until all cinders have thoroughly cooled.

B. Chimney Inspection/Cleaning

Frequency: At least twice a year during heating season or as recommended by a certified chimney sweep
By: Certified chimney sweep

WARNING! Risk of Fire! *Ignited creosote is extremely HOT. Prevent creosote buildup.*

Refer to Figure 3.1 to remove/reinstall termination caps.

Creosote - Formation and Need for Removal

When wood is burned slowly, it produces tar and other organic vapors, which combine with expelled moisture to form creosote. The creosote vapors condense in the relatively cool chimney flue of a slow-burning fire. As a result, creosote residue accumulates on the flue lining. When ignited this creosote makes an extremely hot fire.

WARNING! Risk of Fire! *A chimney fire can permanently damage your chimney system and nearby structures.*

In the event of a chimney fire, Hearth & Home Technologies Inc. recommends

- replacement of the chimney, and
- inspection of the adjacent structure to the provisions of NFPA Level III inspection criteria.

The chimney shall be inspected at least twice a year during the heating season to determine when a creosote buildup has occurred.

When creosote has accumulated it shall be removed to reduce the risk of a chimney fire.

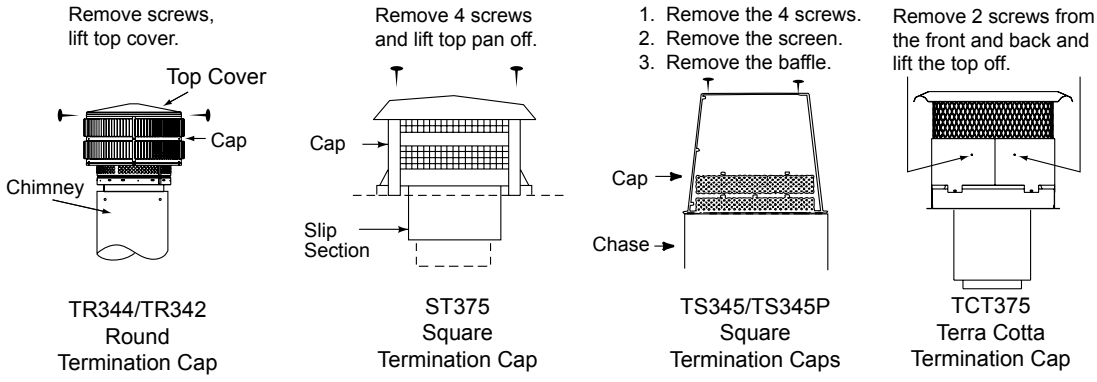


Figure 3.1 Chimney & Termination Cap Cleaning

C. Check Firebox Refractory

Frequency: After each ash removal
By: Homeowner

WARNING! Risk of Fire! *Inspect fireplace refractory. Crumbling, deteriorated refractory can allow overheating of surrounding materials.*

Expansion and contraction will cause minor cracking of the refractory. This is normal. The refractory will require periodic replacement depending on use.

The panels should be replaced if

- Cracks exceed ¼ inch (6 mm) in width,
- Metal is exposed behind the refractory,
- Large pieces of refractory fall out.

D. Inspect Grate

Frequency: After each ash removal
By: Homeowner

Inspect grate for:

- Warping or sagging 1-1/2 in. (38 mm) or more
- Broken welds
- Burn-through of grate bars

For safe operation, replace only with an approved grate from Hearth & Homes Technologies Inc.

E. Glass Cleaning

Frequency: As desired
By: Homeowner

CAUTION! *Handle glass assembly with care. Glass is breakable.*

- *Avoid striking, scratching or slamming glass*
- *Avoid abrasive cleaners*
- ***DO NOT*** *clean glass while it is hot*

Clean glass with a non-abrasive commercially available cleaner or ashes:

- Light deposits
  - Use household glass cleaner
- Heavy deposits
  - Use wood ash on damp cloth or,
  - Use commercial fireplace glass cleaner (consult with your dealer)

4 Troubleshooting Guide

Start Fire Problems	Possible Cause	Solution
Can't get fire started Excessive smoke or spillage Burns too slowly Smolders, sizzles	Not enough kindling/paper or no kindling/paper	Use dry kindling, more paper. Arrange kindling & wood for air movement.
	Damper closed/not fully open	Open damper.
	Not enough air for fire to ignite	Check for restricted cap/shroud.
		Open air kit (if installed).
		Check for flue blockage.
		Pre-warm flue before starting fire (refer to starting fire section).
		Check for adequate vent height (refer to chimney assembly section).
		Open window below the fireplace towards the wind.
	Wood condition is too wet, too large	Use dry, seasoned wood (refer to wood fuel section).
	Bed of coals not established before adding wood	Start with paper & kindling to establish bed of coals (refer to starting fire section).
	Flue blockage such as birds' nests or leaves in termination cap	Have chimney inspected for creosote and cleaned by a certified chimney sweep.
	Down draft or negative pressure Competition with exhaust devices	Do not use exhaust fans during start-up (refer to negative pressure section).
		Open window below the fireplace towards the wind.
Fire burns too fast	Extremely dry or soft wood	Mix in hardwood.
		Mix in less seasoned wood after fire is established (refer to wood fuel section).
	No glass doors	Add glass doors to slow down air flow.
	Overdrafting	Check for correct vent height; too much vertical height creates overdrafting.
		Check location of vent termination (refer to chimney assembly section).

5 Getting Started

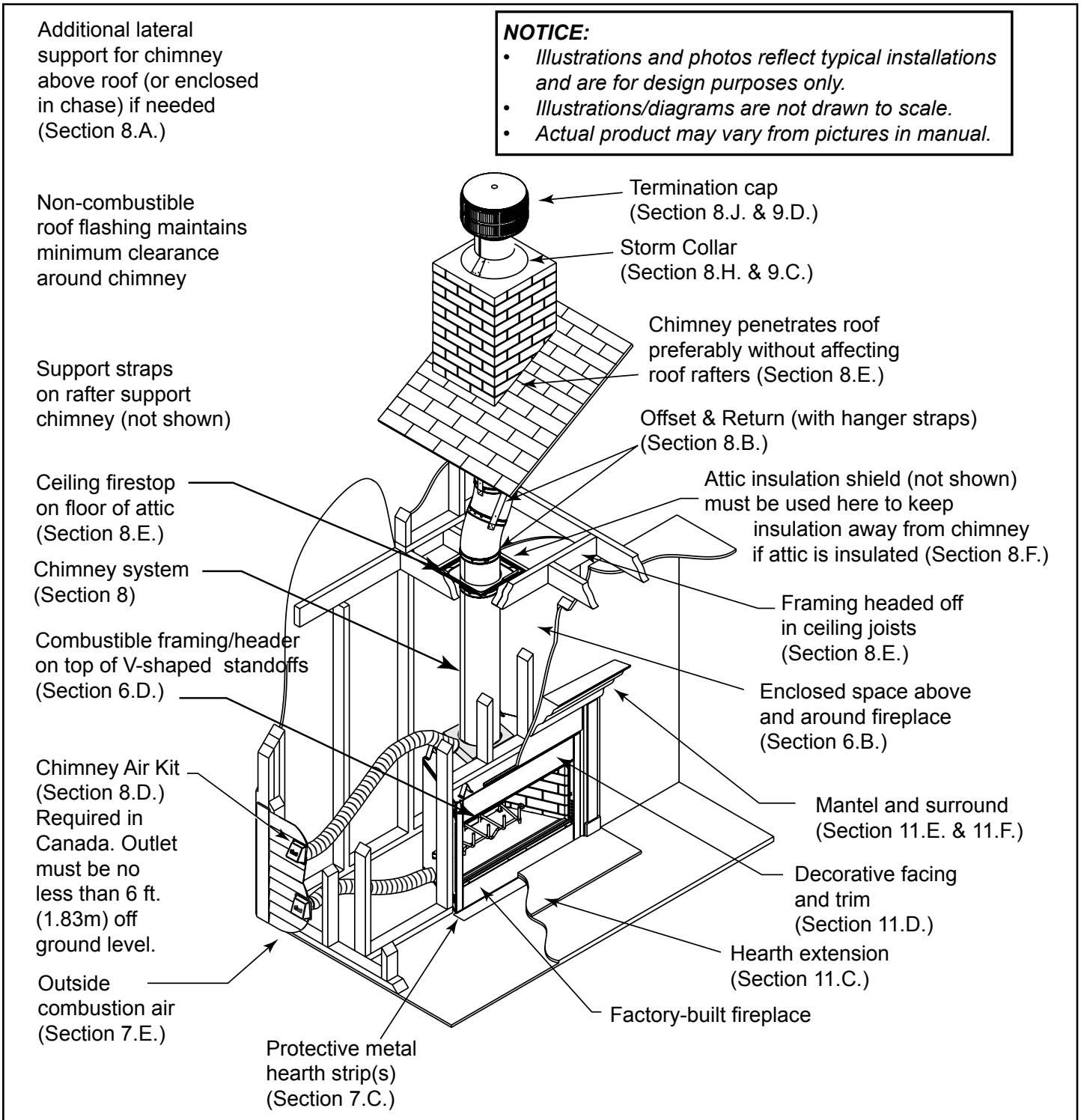

Additional lateral support for chimney above roof (or enclosed in chase) if needed (Section 8.A.)
NOTICE:
• Illustrations and photos reflect typical installations and are for design purposes only.
• Illustrations/diagrams are not drawn to scale.
• Actual product may vary from pictures in manual.
Non-combustible roof flashing maintains minimum clearance around chimney
Termination cap (Section 8.J. & 9.D.)
Storm Collar (Section 8.H. & 9.C.)
Chimney penetrates roof preferably without affecting roof rafters (Section 8.E.)
Support straps on rafter support chimney (not shown)
Offset & Return (with hanger straps) (Section 8.B.)
Ceiling firestop on floor of attic (Section 8.E.)
Attic insulation shield (not shown) must be used here to keep insulation away from chimney if attic is insulated (Section 8.F.)
Chimney system (Section 8)
Framing headed off in ceiling joists (Section 8.E.)
Combustible framing/header on top of V-shaped standoffs (Section 6.D.)
Enclosed space above and around fireplace (Section 6.B.)
Chimney Air Kit (Section 8.D.) Required in Canada. Outlet must be no less than 6 ft. (1.83m) off ground level.
Mantel and surround (Section 11.E. & 11.F.)
Decorative facing and trim (Section 11.D.)
Hearth extension (Section 11.C.)
Outside combustion air (Section 7.E.)
Factory-built fireplace
Protective metal hearth strip(s) (Section 7.C.)

Figure 5.1 Typical Fireplace System

B. Design and Installation Considerations

NOTICE: *Check building codes prior to installation.*

- Installation MUST comply with local, regional, state and national codes and regulations.
- Consult insurance carrier, local building inspector, fire officials or authorities having jurisdiction over restrictions, installation inspection and permits.

Before installing, determine the following:

- Where the fireplace is to be installed
- The vent system configuration to be used
- Gas supply piping
- Electrical wiring
- Framing and finishing details
- Whether optional accessories—devices such as a fan, wall switch or remote control—are desired

NOTICE: *Junction box should be installed during initial setup to avoid major reconstruction.*

C. Draft

Draft is the pressure difference needed to vent fireplaces successfully. When a fireplace is drafting successfully, all combustion byproducts are exiting the home through the chimney.

Considerations for successful draft include:

- Preventing negative pressure
- Location of fireplace and chimney

NOTICE: *Hearth & Home Technologies assumes no responsibility for the improper performance of the fireplace system caused by:*

- *Inadequate draft due to environmental conditions*
- *Downdrafts*
- *Tight sealing construction of the structure*
- *Mechanical exhausting devices*
- *Improper location of the chimney*

D. Negative Pressure

WARNING! Risk of Asphyxiation! *Negative pressure can cause spillage of combustion fumes and soot. Fire must draft properly for safe operation.*

Negative pressure results from the imbalance of air available for the fireplace to operate properly. It can be strongest in lower levels of the house.

Causes include:

- Exhaust fans (kitchen, bath, etc.)
- Range hoods
- Combustion air requirements for furnaces, water heaters and other combustion appliances
- Clothes dryers
- Location of return-air vents to furnace or air conditioning
- Imbalances of the HVAC air handling system
- Upper level air leaks such as:
  - Recessed lighting
  - Attic hatch
  - Duct leaks

To minimize the effects of negative air pressure:

- Install the outside air kit with the intake facing prevailing winds during the heating season
- Ensure adequate outdoor air for all combustion appliances and exhaust equipment
- Ensure furnace and air conditioning return vents are not located in the immediate vicinity of the fireplace
- Avoid installing the fireplace near doors, walkways or small isolated spaces
- Recessed lighting should be a “sealed can” design
- Attic hatches weather stripped or sealed
- Attic mounted duct work and air handler joints and seams taped or sealed
- Basement installations should be avoided

NOTICE: *Hearth & Home Technologies Inc. recommends the use of direct vent fireplaces in basements.*

E. Locating Fireplace & Chimney

Location of the fireplace and chimney will affect performance.

- Install within the warm airspace enclosed by the building envelope. This helps to produce more draft, especially during lighting and die-down of the fire.
- Penetrate the highest part of the roof. This minimizes the effects of wind loading.
- Locate termination cap away from trees, adjacent structures, uneven roof lines and other obstructions.
- Minimize the use of chimney offsets.
- Consider the fireplace location relative to floor and ceiling and attic joists.
- Take into consideration the termination requirements in Section 8 and Section 9.

NOTICE: *Locating the fireplace in a basement or in a location of considerable air movement can cause intermittent smoke spillage from fireplace. Do not locate fireplace near*

- *frequently open doors*
- *central heat outlets or returns*

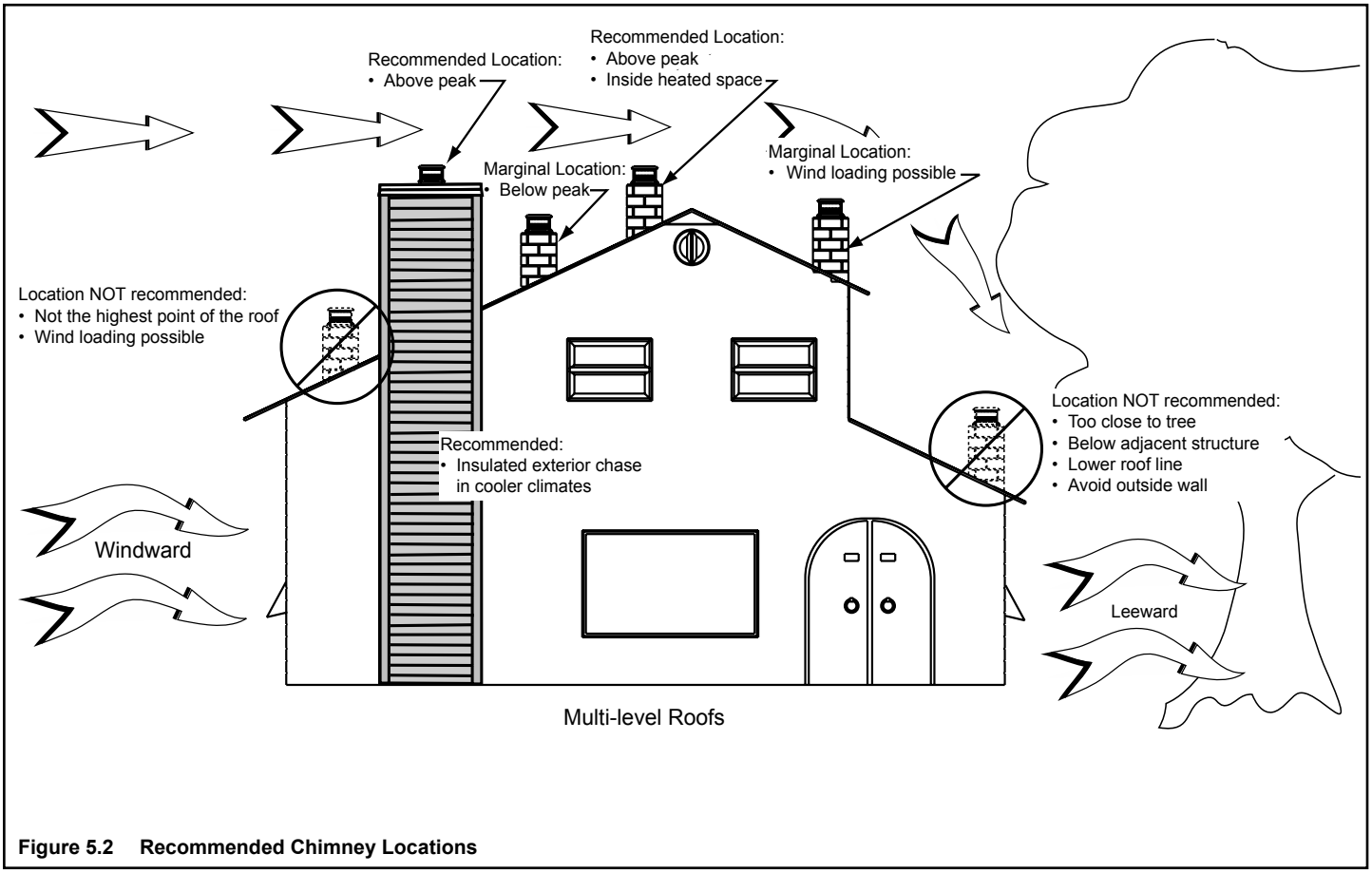


Figure 5.2 Recommended Chimney Locations

F. Tools and Supplies Needed

Before beginning the installation be sure the following tools and building supplies are available:

Reciprocating saw	Framing material
Pliers	Non-combustible sealant
Hammer	Gloves
Phillips screwdriver	Framing square
Flat blade screwdriver	Electric drill and bits
Plumb line	Safety glasses
Level	Tape measure

1/2-3/4 in. length, #6 or #8 self-drilling screws

Misc. screws and nails

G. Fireplace System Requirements

This fireplace system requires:

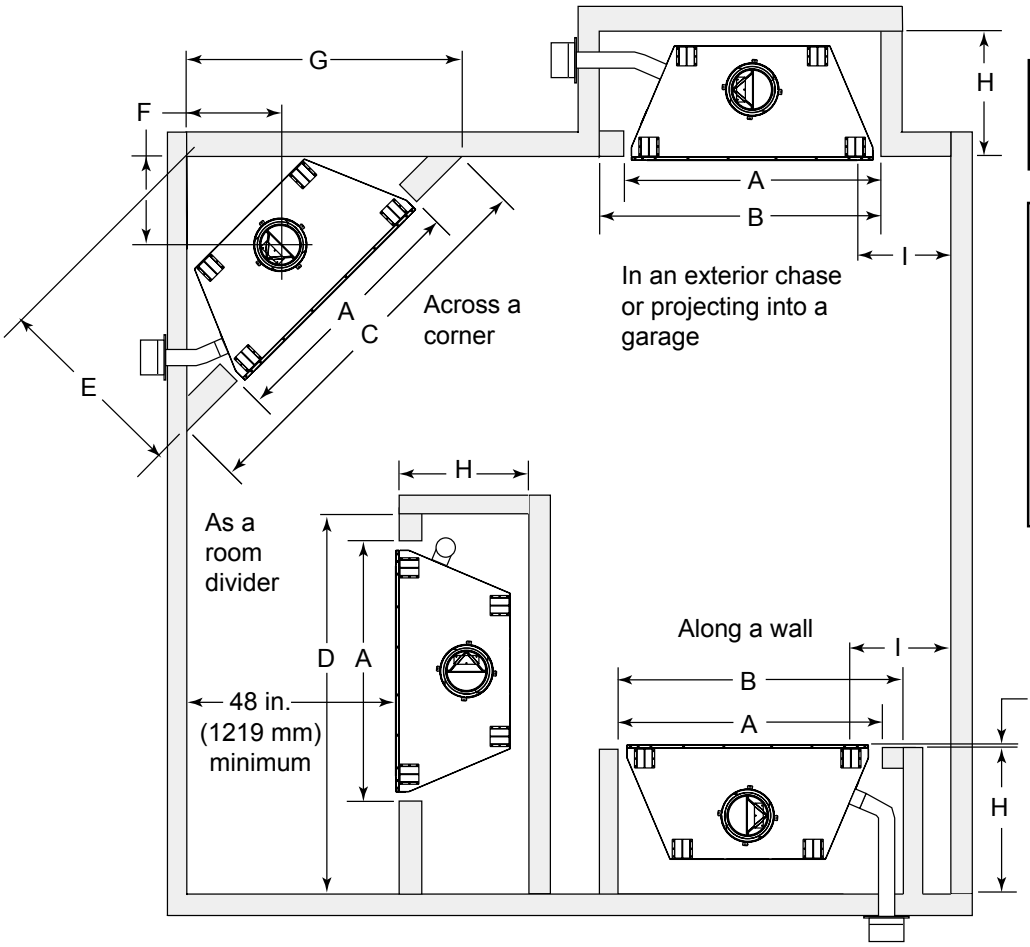
- Fireplace
- Hearth Refractory
- Grate Assembly
- Hearth Extension (required, sold separately)
- Chimney Air Kit (required in Canada)
- Chimney System (required, sold separately)
- Termination Cap (required, sold separately)

H. Inspect Fireplace and Components

WARNING! Risk of Fire and/or Explosion! *Damaged parts could impair safe operation.* ***DO NOT*** *install damaged, incomplete or substitute components. Keep fireplace dry.*

- Remove fireplace and components from packaging and inspect for damage.
- Vent system components and doors are shipped in separate packages.
- Report to your dealer any parts damaged in shipment.
- **Read all the instructions before starting the installation. Follow these instructions carefully during the installation to ensure maximum safety and benefit.**

A. Select Fireplace Location



Note: 1/2 in. (13 mm) min. air space from fireplace to combustible materials.

Note: In addition to these framing dimensions, also reference the following sections:
- Clearances (Section 6.B.)
- Mantel Projections (Section 11.E.)
- Fireplace Dimensions (Section 13.A.)

Note: *Measurements are FRAMING dimensions only and do not include drywall either in the cavity or on the interior walls.*

Model		A	B	C	D	E	F	G	H	I
RH-36	*inches*	42	50	67 7/8	59 1/2	34	14	48	21 1/2	12 in. (305 mm) Minimum from FP opening to any perpendicular wall.
	mm	1067	1270	1724	1511	864	356	1219	546	
RH-42	*inches*	48	56	73 7/8	65 1/2	37 1/4	14	52 1/4	21 1/2	
	mm	1219	1422	1876	1664	946	356	1327	546	

Figure 6.1 Fireplace Locations (Framing dimensions shown)

B. Clearances

WARNING! Risk of Fire! *You must comply with all minimum air space clearances to combustibles as specified in Figure 6.2.* ***DO NOT*** *pack required air spaces with insulation or other materials.*

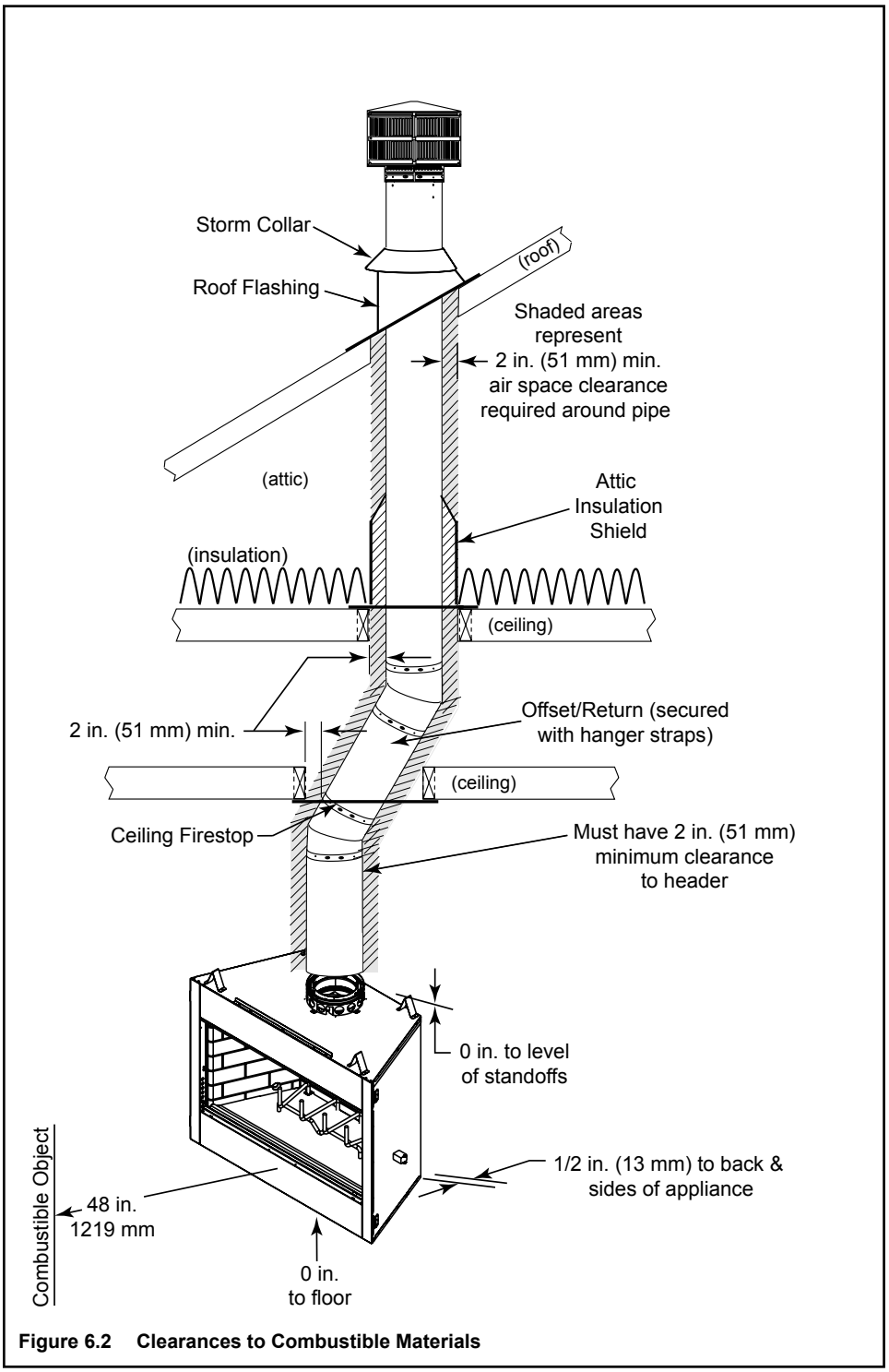
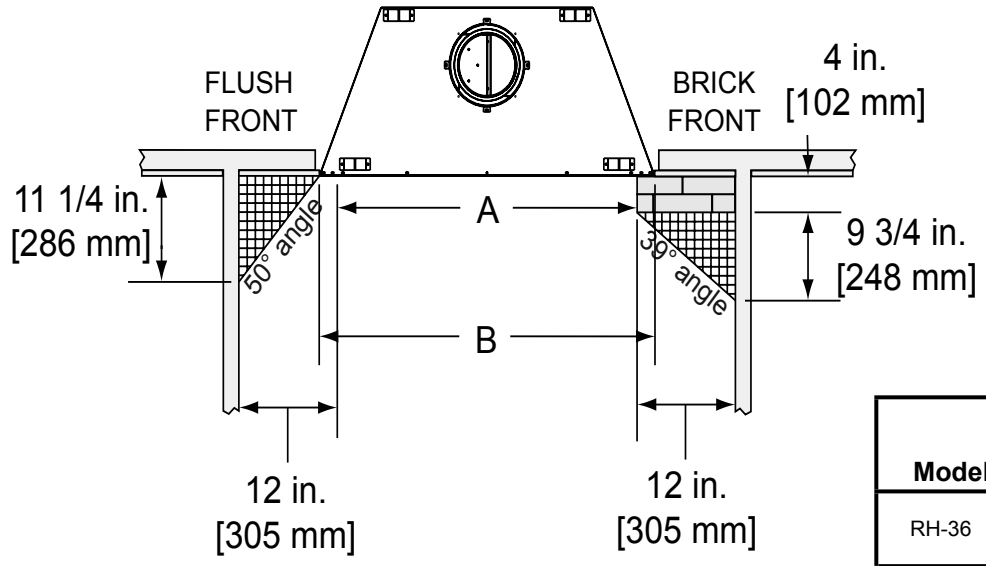

Storm Collar
Roof Flashing
(roof)
Shaded areas represent 2 in. (51 mm) min. air space clearance required around pipe
(attic)
Attic Insulation Shield
(insulation)
(ceiling)
2 in. (51 mm) min.
Offset/Return (secured with hanger straps)
(ceiling)
Ceiling Firestop
Must have 2 in. (51 mm) minimum clearance to header
0 in. to level of standoffs
1/2 in. (13 mm) to back & sides of appliance
Combustible Object
48 in. 1219 mm
0 in. to floor

Figure 6.2 Clearances to Combustible Materials

Note: Chimney air kit is not shown, but is required in Canada.

C. Sidewalls/Surrounds

- Adjacent combustible sidewalls must be located a minimum of 12 in. (305 mm) from the fireplace opening.
- Combustible and noncombustible mantel legs, surrounds and stub walls may be constructed within the gridded area, Figure 6.3.



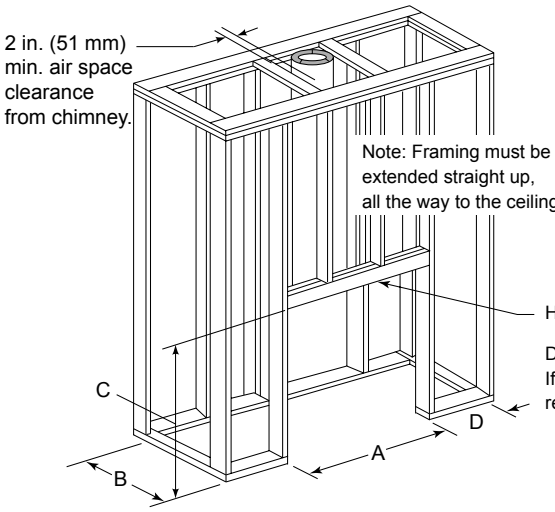
Model #		A Fireplace Opening	B Outside Dimensions
RH-36	*in.*	36	41
	mm	914	1041
RH-42	*in.*	42	47
	mm	1067	1194

Figure 6.3 Mantel Leg or Wall Projections (Acceptable on both sides of opening)

D. Frame the Fireplace

Figure 6.4 shows typical framing using combustible materials (2x4 lumber shown).

- Observe all required air space clearances to combustible materials as shown in Figure 6.1 & 6.2.
- Framing across the top of fireplace must be above top standoffs.


2 in. (51 mm)
min. air space
clearance
from chimney.
Note: Framing must be
extended straight up,
all the way to the ceiling.
Header MUST NOT be notched!
D = extra space needed for outside air connection.
If outside air duct has no bend, this dimension may be
reduced as long as minimum clearances are met.
C
D
A
B

Model		A	B*	C**	D
RH-36	*in.*	42	21 1/2	39 3/4	8
	mm	1067	546	1010	203
RH-42	*in.*	48	21 1/2	39 3/4	8
	mm	1219	546	1010	203

* If interior of chase will be drywalled, add the thickness to this measurement.

** Adjust header height for a raised floor under fireplace.

Figure 6.4 Framing the Fireplace

7 Installation of Fireplace

CAUTION! Risk of Cuts/Abrasions. *Wear protective gloves and safety glasses during installation. Sheet metal edges are sharp.*

A. Things to Consider

- Location of chimney air kit (see Figure 7.4)
- Location(s) of outside air kit
- Electrical connections and/or wall switch
- Gas line piping

B. Position the Fireplace

- Place the fireplace on a continuous flat surface.
- Follow framing instructions in Section 6.

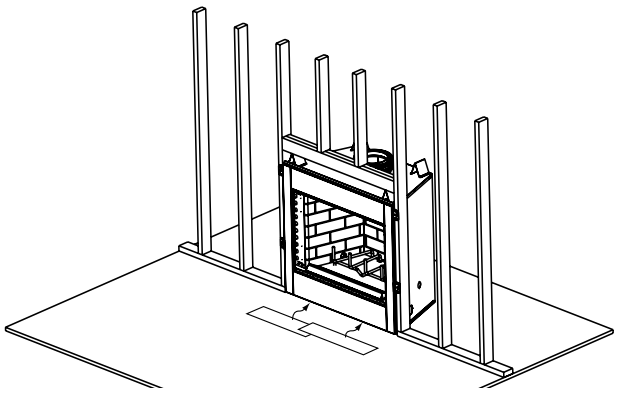
WARNING! Risk of Fire! *Prevent contact with sagging, loose insulation.*

- ***DO NOT*** *install against vapor barriers or exposed insulation.*
- *Secure insulation and vapor barriers.*
- *Provide minimum air space clearances at the sides and back of the fireplace assembly as outlined in Section 6.*

C. Place Protective Metal Hearth Strips

WARNING! Risk of Fire! *Protective metal hearth strips MUST be installed.* ***DO NOT*** *cover metal strips with combustible materials. Sparks or embers may ignite flooring.*

- Refer to Figures 7.1 and 7.2.
- Locate the two protective metal hearth strips measuring approximately 26 in. x 4 in. (660 mm x 102 mm) included with this fireplace.
- Slide each metal strip 2 in. (51 mm) under front edge of fireplace.
- Overlap strips in the middle of fireplace opening by 1 in. (25 mm) minimum..
- Metal strips must extend beyond the front and sides of the fireplace opening by at least 2 in. (51 mm).
- Protect the front of a platform elevated above the hearth extension with metal strips (not included with fireplace) per Figure 7.2. See Section 11 for hearth extension instructions.



Protective metal strips are placed 2 in. (51 mm) under the front of the fireplace and must extend beyond the front and sides of fireplace opening by 2 in. (51 mm)

Figure 7.1 Position the Protective Metal Hearth Strips

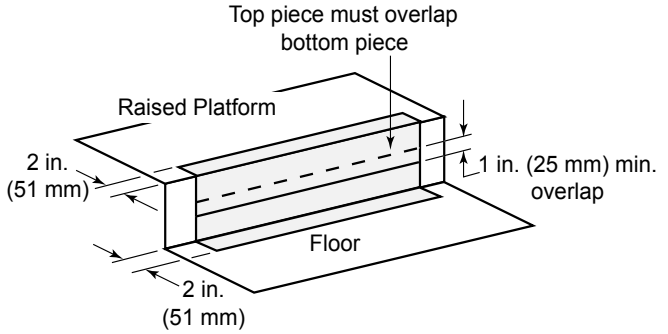


Figure 7.2 Protect the Front of an Elevated Platform

D. Level Fireplace

- Level fireplace side-to-side and front-to-back.
- Shim with non-combustible material as necessary.
- Secure fireplace to framing with nailing flanges with a minimum of two fasteners per nailing flange.
- Check fireplace opening for square to ensure proper fit of glass doors. Measure diagonals of fireplace opening to make sure they are equal.

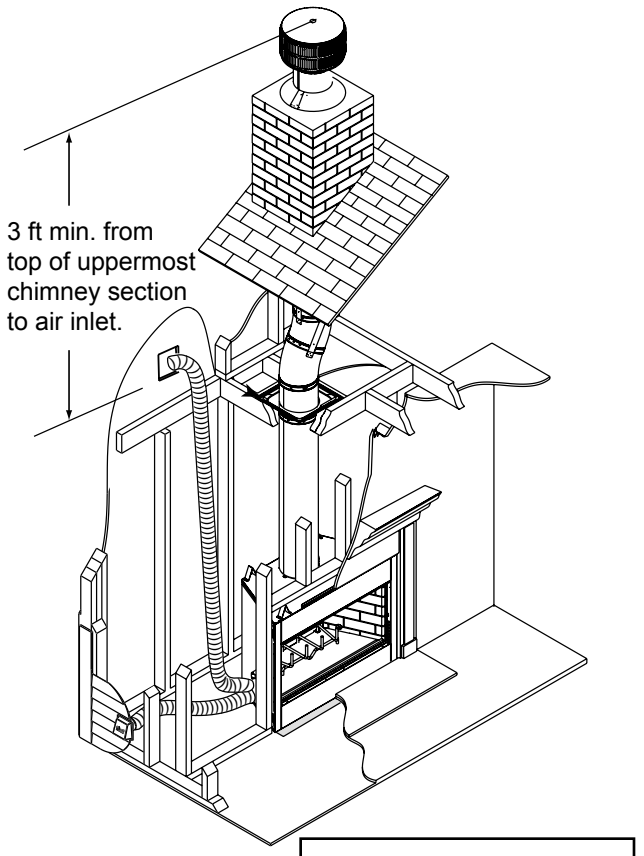


Figure 7.3 Possible Outside Air Inlet Locations

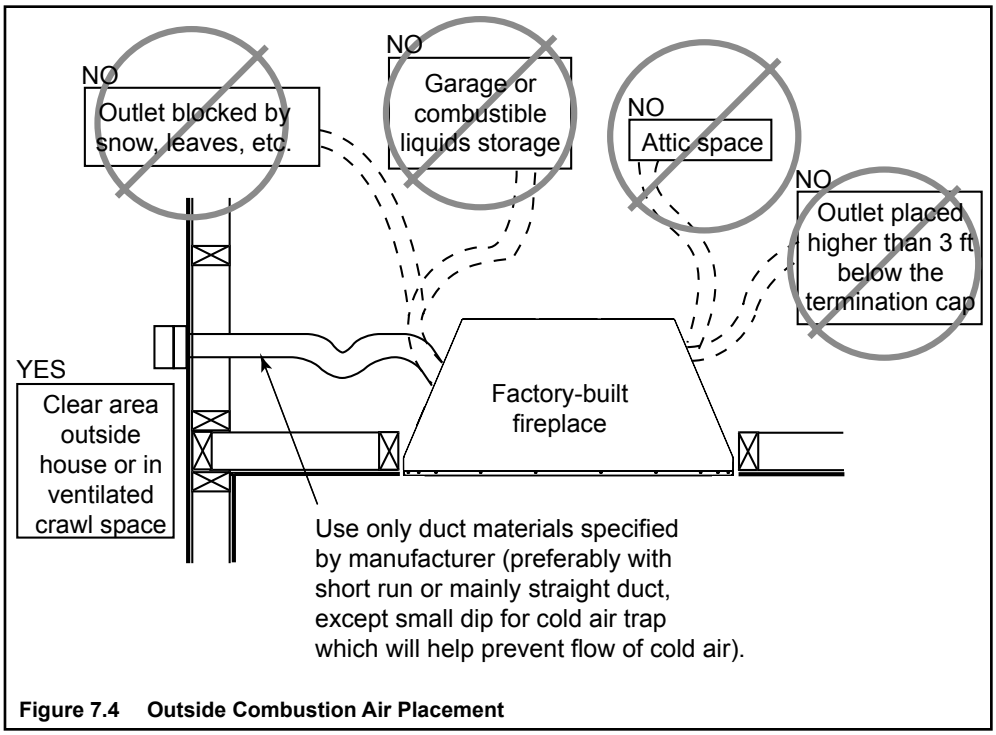

NO
Outlet blocked by snow, leaves, etc.
NO
Garage or combustible liquids storage
NO
Attic space
NO
Outlet placed higher than 3 ft below the termination cap
YES
Clear area outside house or in ventilated crawl space
Factory-built fireplace
Use only duct materials specified by manufacturer (preferably with short run or mainly straight duct, except small dip for cold air trap which will help prevent flow of cold air).

Figure 7.4 Outside Combustion Air Placement

E. Install Outside Air Kit

- Optional.
- Keep duct runs short and straight to minimize restriction. A small dip is acceptable for a cold air trap.
- The outside air kit must be installed on the left hand side of the fireplace.
- Locate the outside air hood in a clear area, preferably into prevailing wind during the heating season. Refer to Figure 5.2.
- Install as shown in Figures 7.3, 7.4 and 7.5.
- The air duct may be run vertically.
- The outside air hood must be at least 3 ft (.91 m) below the top of the uppermost chimney section.

CAUTION! Risk of Fire or Asphyxiation! DO NOT *draw outside combustion air from wall, floor or ceiling cavity, or enclosed spaces such as an attic or garage.*

- ***DO NOT*** *place outside air hood close to exhaust vents or chimneys. Fumes or odor could be drawn into the room through the fireplace.*
- *Locate outside air inlet to prevent blockage from leaves, snow/ice, or other debris. Blockages could cause combustion air starvation.*

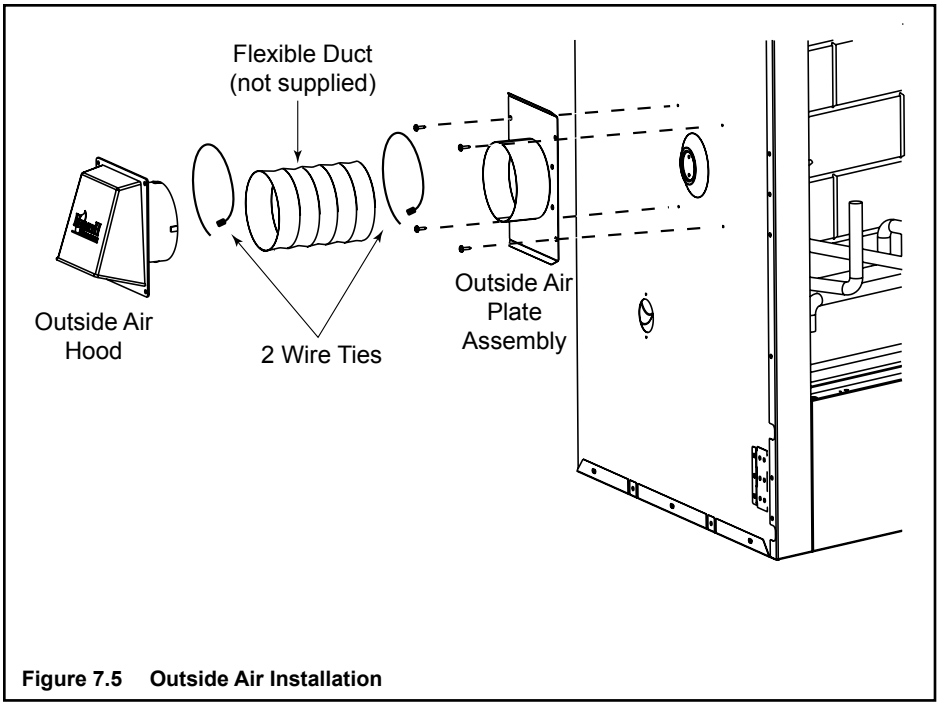


Figure 7.5 Outside Air Installation

8 Chimney Assembly

NOTICE: *Chimney performance may vary.*

- *Trees, buildings, roof lines and wind conditions affect performance.*
- *Chimney height may need adjustment if smoking or overdraft occurs.*

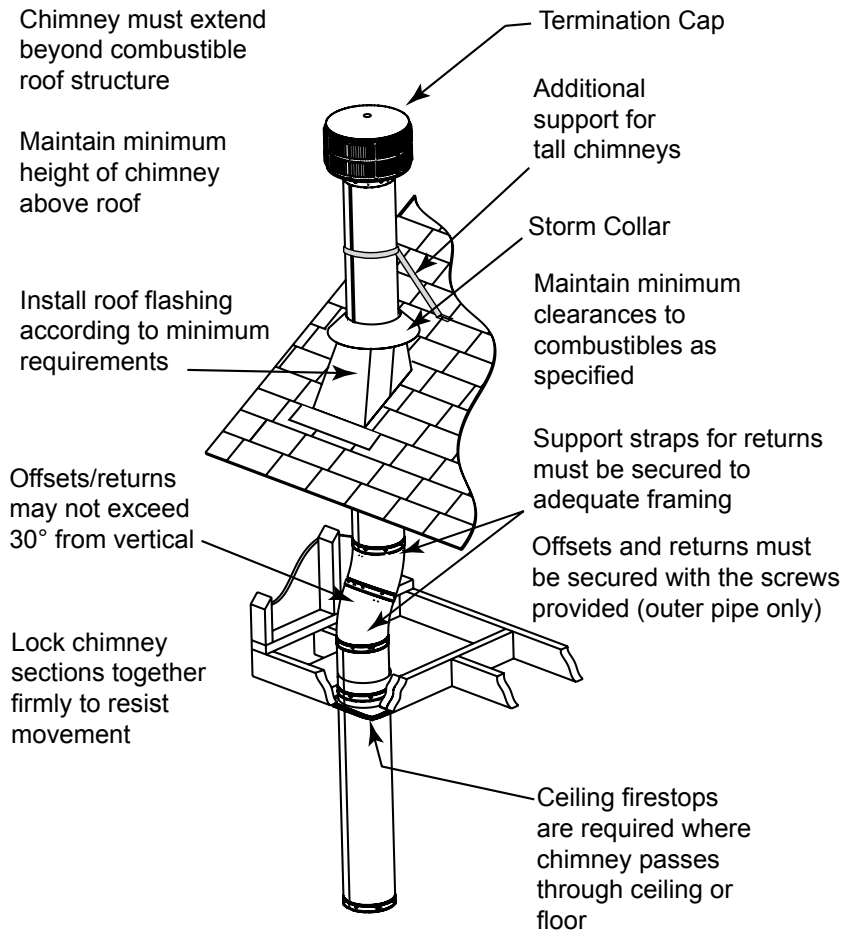

Chimney must extend beyond combustible roof structure
Termination Cap
Additional support for tall chimneys
Maintain minimum height of chimney above roof
Storm Collar
Maintain minimum clearances to combustibles as specified
Install roof flashing according to minimum requirements
Support straps for returns must be secured to adequate framing
Offsets/returns may not exceed 30° from vertical
Offsets and returns must be secured with the screws provided (outer pipe only)
Lock chimney sections together firmly to resist movement
Ceiling firestops are required where chimney passes through ceiling or floor

Figure 8.1 Typical Chimney System - Guidelines for Chimney System Installation

A. Chimney Requirements

Measure vertical distances from the base of the fireplace as shown in Figure 8.2.

- Minimum overall straight height 13 (3.96 m)
- Minimum height with offset/return 14.5 ft (4.42 m)
- Maximum height 90 ft (27.43 m)
- Maximum chimney length between an offset and return 20 ft (6.1 m)
- Maximum distance between chimney stabilizers 35 ft (10.67 m)
- Double offset/return minimum height 20 ft (6.1 m)
- Maximum unsupported chimney length between the offset and return 6 ft (1.83 m)
- Maximum unsupported chimney height above the fireplace 35 ft (10.67 m)
- Maximum unsupported chimney above roof 6 ft (1.83 m)

WARNING! Risk of Fire! *You must maintain 2 in. (51 mm) air space clearance to insulation and other combustible materials around the chimney system. Failure to do so may cause overheating and fire.*

Table 8.1

HEIGHT OF CHIMNEY COMPONENTS		*in.*	*mm*
Chimney Stabilizer			
	SL3	4-3/4	121
Ceiling Firestops			
	FS338	0	0
	FS339	0	0
	FS340	0	0
Offsets/Returns			
	SL315	13-3/8	340
	SL330	15-1/2	394
Roof Flashing			
	RF370	0	0
	RF371	0	0
Chimney Sections*			
	SL306	4-3/4	121
	SL312	10-3/4	273
	SL318	16-3/4	425
	SL324	22-3/4	578
	SL336	34-3/4	883
	SL348	46-3/4	1187

*** Dimensions reflect effective height.**

Determine the chimney components needed to complete your particular installation:

- Measure the total vertical height of the fireplace installation from the base of the fireplace assembly to the approximate location of the bottom of the termination cap.
- Subtract the effective height of the fireplace assembly (see Figure 8.2) from the total vertical height to determine the overall height of the chimney installation.
- Create a schematic for your application similar to Figure 8.2 showing components required (referring to Table 8.1). Figure 8.1 identifies those components and where used.
- Install a ceiling firestop whenever the chimney penetrates a floor/ceiling.

NOTICE: *A maximum of two pairs of offsets and returns may be used.*

CAUTION! Risk of Fire and/or Asphyxiation! DO NOT *connect this fireplace to a chimney flue servicing another appliance.* ***DO NOT*** *connect to any air distribution duct or system. These actions could cause overheating/fire in the chimney flue, or release of exhaust fumes into the living areas.*

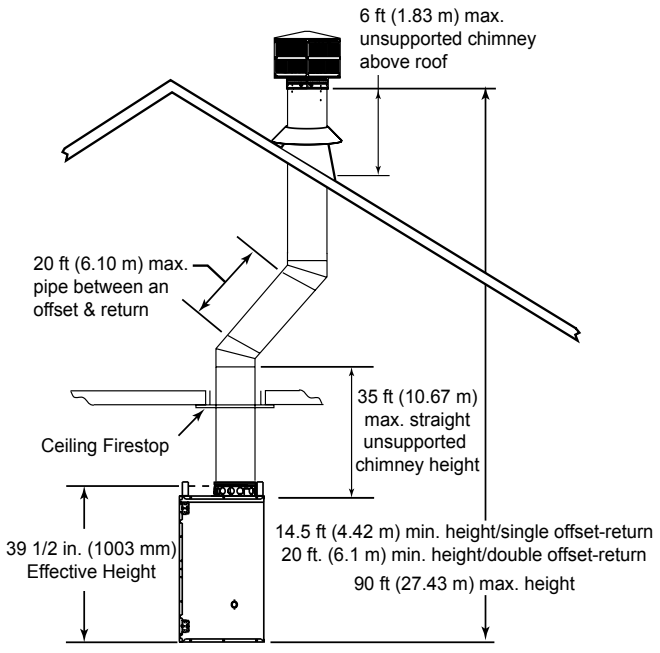


Figure 8.2 Chimney Requirements

B. Using Offsets/Returns

- Use an offset/return to bypass overhead obstructions.
- An offset and return can be used as a single entity or separated by chimney section(s).

  ***WARNING! Risk of Fire! DO NOT** use offset/returns greater than 30°. Chimney draft will be restricted and could cause overheating and fire.*

- Measure the shift needed to avoid the overhead obstruction. Refer to dimension A in Figure 8.3.
- Find the appropriate A dimension listed in Table 8.2.
- The B dimension coinciding with the A dimension measurement in Table 8.2 represents the required vertical clearance needed to complete the offset/return.
- Read across the chart to find the number of chimney sections/model numbers needed between the offset and return.

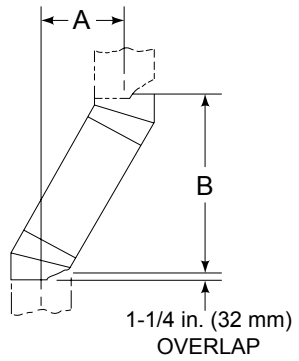


Figure 8.3 Chimney Offset/Return

Example:

Your “A” dimension from Figure 8.3 is 14 1/2 in. (368 mm). Using Table 8.2 the dimension closest to, but not less than 14 1/2 in. (368 mm) is 14 1/2 in. (368 mm) using a 30° offset/return.

You determine from the table that you need 34 1/8 in. (867 mm) (Dimension “B”) between the offset and return.

The chimney component that best fits your application is one SL324.

Table 8.2

15-degree										30-degree			
A Offset		B Height								A Offset		B Height	
in.	*mm*	*in.*	*mm*	SL306	SL312	SL318	SL324	SL336	SL348	*in.*	*mm*	*in.*	*mm*
1-5/8	41	13-3/8	340	-	-	-	-	-	-	3-5/8	92	15-1/2	394
2-7/8	73	17-3/4	451	1	-	-	-	-	-	5-1/2	140	18-5/8	473
4-1/8	102	22-3/8	568	2	-	-	-	-	-	7-1/4	184	21-3/4	552
4-1/2	114	23-5/8	600	-	1	-	-	-	-	8-1/2	216	23-3/4	603
5-3/4	146	28-1/4	718	1	1	-	-	-	-	10-1/4	260	27	686
6	152	29-3/8	746	-	-	1	-	-	-	11-1/2	292	29	737
7-1/4	184	34	864	-	2	-	-	-	-	13-1/4	337	32-1/8	816
7-3/4	197	36-1/8	918	-	-	-	1	-	-	14-1/2	368	34-1/8	867
8-3/4	222	39-3/4	1010	1	-	-	1	-	-	16-1/4	413	37-3/8	949
10-3/8	264	45-5/8	1159	-	-	2	-	-	-	19-1/4	489	42-1/2	1080
10-5/8	270	46-3/4	1187	-	-	-	-	1	-	20-1/2	521	44-5/8	1133
11-7/8	302	51-3/8	1305	1	-	-	-	1	-	22-1/4	565	47-3/4	1213
13-1/2	243	57-1/4	1454	-	-	-	2	-	-	25-1/4	641	52-7/8	1343
13-3/4	349	58-3/8	1483	-	-	-	-	-	1	26-1/2	673	55	1397
15	381	63	1600	1	-	-	-	-	1	28-1/4	718	58-1/8	1476
16-1/2	419	68-3/4	1746	-	1	-	-	-	1	31-1/4	794	63-1/4	1607
18	457	74-5/8	1895	-	-	1	-	-	1	34-1/4	870	68-1/2	1740
19-5/8	498	80-3/8	2042	-	-	-	1	-	1	37-1/4	946	73-3/4	1873
20-5/8	524	84-1/8	2137	1	-	-	1	-	1	39-1/8	994	76-7/8	1953
22-3/4	578	91-7/8	2334	-	-	-	-	1	1	43-1/4	1099	84-1/8	2137
24	610	96-1/2	2451	1	-	-	-	1	1	45-1/8	1146	87-1/4	2216
25-7/8	657	103-1/2	2629	-	-	-	-	-	2	49-1/4	1251	94-1/2	2400

Proper assembly of air-cooled chimney parts result in an overlap at chimney joints of 1-1/4 in. (32 mm). Effective length is built into this chart.

C. Assemble Chimney Sections

WARNING! Risk of Fire! DO NOT *install substitute or damaged chimney components.*

- *Use only those components described in this manual.*

Substitute or damaged chimney components could impair safe operation and cause overheating and fire.

- Support the pipe during construction and check to be sure inadvertent loading has not dislodged the chimney section from the fireplace or at any chimney joint.
- Attach a straight chimney section or an offset to the top of the fireplace.
- Place inner flue to the inside of the chimney section below it. Place the outer casing outside the outer casing of the chimney section below it. Refer to Figure 8.4.

  NOTICE: *Chimney sections cannot be disassembled once locked together. Plan ahead!*

- Lock chimney sections and/or offsets/returns together by pushing downward until the top section meets the stop bead on the lower section.
- Pull on the top section to make sure it is fully engaged and will not separate.
- You may use #6 or #8 sheet metal screws no longer than 1/2 in. (13 mm) to fasten chimney sections together. Do NOT penetrate inner flue.

  WARNING! Risk of Fire! *You MUST use screws (provided) to fasten offset/returns to chimney sections to keep the chimney parts from twisting. Failure to do so could cause fire.*

- Fasten offset/returns to chimney sections. Insert the screws (provided) through the predrilled holes. Do NOT penetrate inner flue.
- Secure chimney returns with hanger straps provided; fasten to studs or joists.
- Vertical straight runs of chimney must be supported every 35 ft (10.7 m).

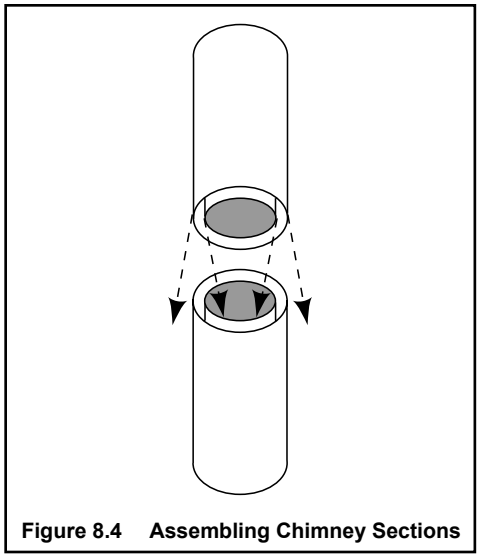


Figure 8.4 Assembling Chimney Sections

D. Install Chimney Air Kit

- Required in Canada.
- Follow instructions provided with this accessory.

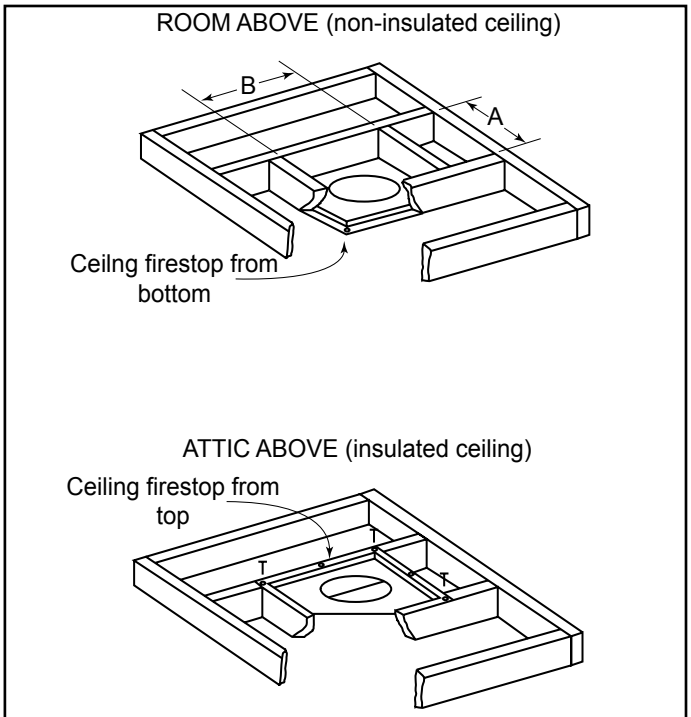
E. Install Ceiling Firestops

CAUTION! Risk of Fire! *Ceiling firestops must be used whenever the chimney penetrates a ceiling/floor.*

- *Chase construction requires ceiling firestops at each floor or every 10 ft (3.05 m) of clear space.*
- *The ceiling firestop slows spread of fire and reduces cold air infiltration.*

- Install a ceiling firestop whenever chimney penetrates ceiling/floor.
- Mark and cut an opening in ceiling as shown in Figure 8.5.
- Frame the opening with the same size lumber used in the ceiling joists.
- Nail the ceiling firestop to the bottom of the ceiling joists when there is a room above.
- Use an attic insulation shield if the ceiling is insulated. The ceiling firestop may then be attached above or below the joists.

WARNING! Risk of Fire! DO NOT *seal area between firestop opening and chimney pipe except where they enter the attic or leave the warm air envelope of the home (use 600° F sealant).*



Note: Use same dimensional lumber for framing ceiling firestop and joists.

	A		B		
Catalog #	*in.*	*mm*	*in.*	*mm*	**Angle**
FS338	14-1/2	368	14-1/2	368	0°
FS339	14-1/2	368	18-3/8	467	15°
FS340	14-1/2	368	23	584	30°

Figure 8.5 Installing the Ceiling Firestop

F. Install Attic Insulation Shield

WARNING! Risk of Fire! *You MUST install an attic insulation shield when there is any possibility of insulation or other combustible material coming into contact with the chimney.*

- ***DO NOT*** *pack insulation between the chimney and the attic insulation shield.*
- *Failure to keep insulation and other materials away from chimney pipe could cause fire.*
- ***DO NOT*** *offset chimney inside insulation shield.*

Installation of a ceiling firestop is required

- Refer to Figures 8.6 - 8.8.
- Roll the shield (around the chimney if already installed) until you have a 3 in. (76 mm) overlap and the three holes on each side match up (large holes on top).
- Insert three screws into the matching holes to form a tube.
- Bend three tabs on the bottom of the tube inward to 90° to maintain chimney air space (refer to Figure 8.6).
- Rest the insulation shield on the ceiling firestop below.
- Bend the three short tabs at the top of the shield inward to 90° to maintain the 2 in. (51 mm) air space from the chimney.
- Bend the remaining top tabs to just meet the pipe.

If you wish to make a custom shield or barrier, follow these guidelines:

- Metal is preferred, although any material stiff enough to hold back the insulation can be used.

  WARNING! Risk of Fire! *Use of cardboard or other materials that can deflect under humidity or other environmental conditions is not recommended.*

- The shield or barrier must be tall enough to extend above the insulation and prevent blown-in insulation from spilling into the cavity.
- Maintain specified air spaces around chimney.
- Check instructions and local codes for further details.

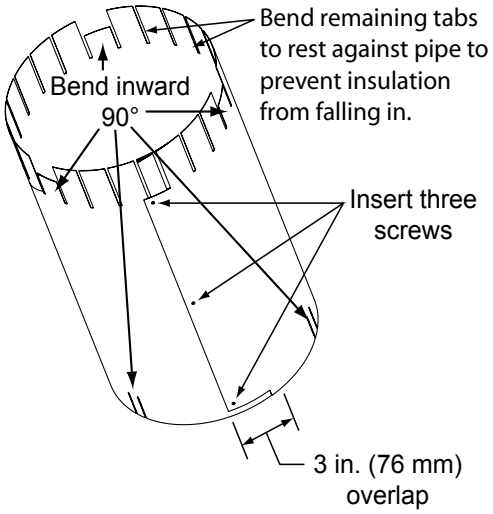

Bend remaining tabs to rest against pipe to prevent insulation from falling in.
Bend inward 90°
Insert three screws
3 in. (76 mm) overlap

Figure 8.6 Prepare Attic Insulation Shield

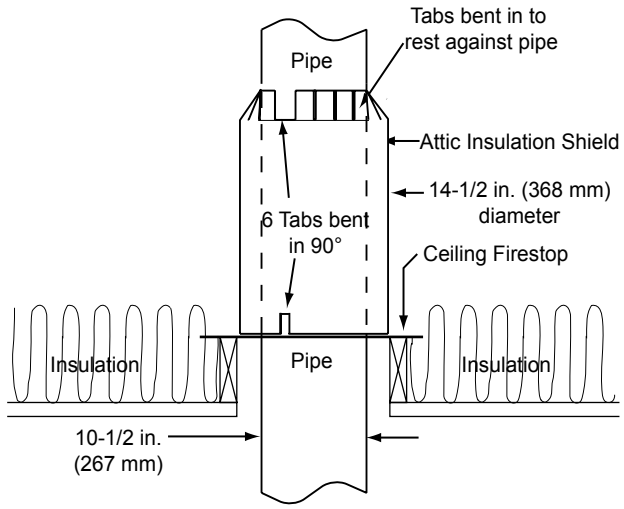


Figure 8.7 Install Attic Insulation Shield (firestop above ceiling)

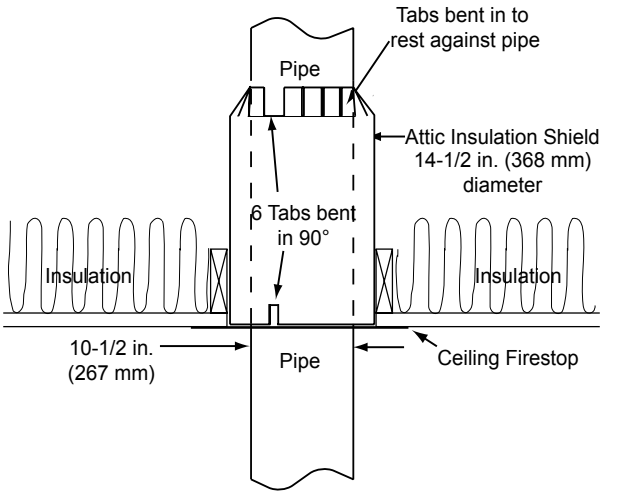


Figure 8.8 Install Attic Insulation Shield (firestop below ceiling)

G. Cut out Hole in Roof

- Refer to Figure 8.9.
- Plumb from roof to center of chimney.
- Drive a nail up through roof to mark center of pipe.
- Measure to either side of nail and mark the 14-1/2 in. x 14-1/2 in. (368 mm x 368 mm) opening required.
- Measure opening on the horizontal; actual length may be larger depending on roof pitch.
- Cut out and frame opening.
- Refer to **Chapter 25** of the **Uniform Building Code** for roof framing details.

H. Complete Installation

WARNING! Risk of Fire! *You MUST maintain 2 in. (51 mm) air space to insulation and other combustible materials around the chimney system. Failure to do so could cause overheating and fire.*

- Keep chimney sections from separating or twisting.
- You may secure straight chimney sections at the joints with screws no longer than 1/2 in. (13 mm).

The following steps should be skipped if using a chase.

- Install roof flashing appropriate to roof pitch.
- Install round termination cap and storm collar.

I. Install Flashing

- Assemble chimney so it passes through the framed opening.
- Slip the flashing over the chimney.

  NOTICE: *Roofing shingles must be below the flashing plate on the lower side of a sloped roof and over the flashing plate on the sides and top.*

- Nail the flashing to the roof. Keep gaps between the flashing plate and the roof to a minimum.
- Caulk the flashing plate and roof junction as well as the vertical seam on the flashing. All nail heads must be caulked with a roofing sealant.

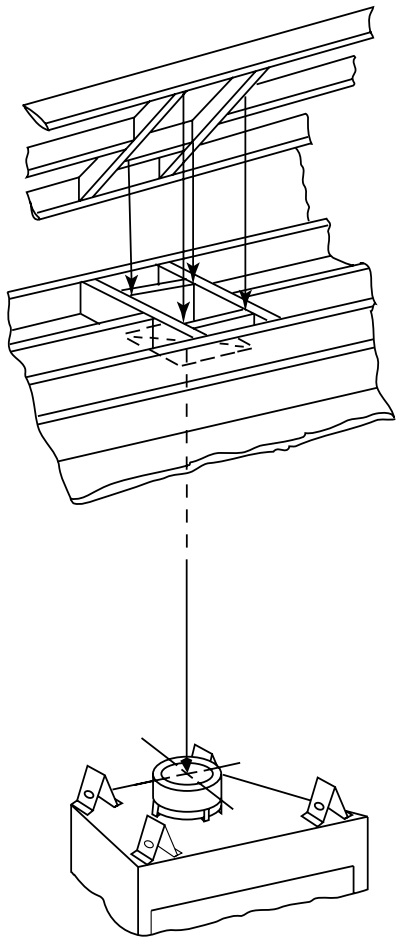
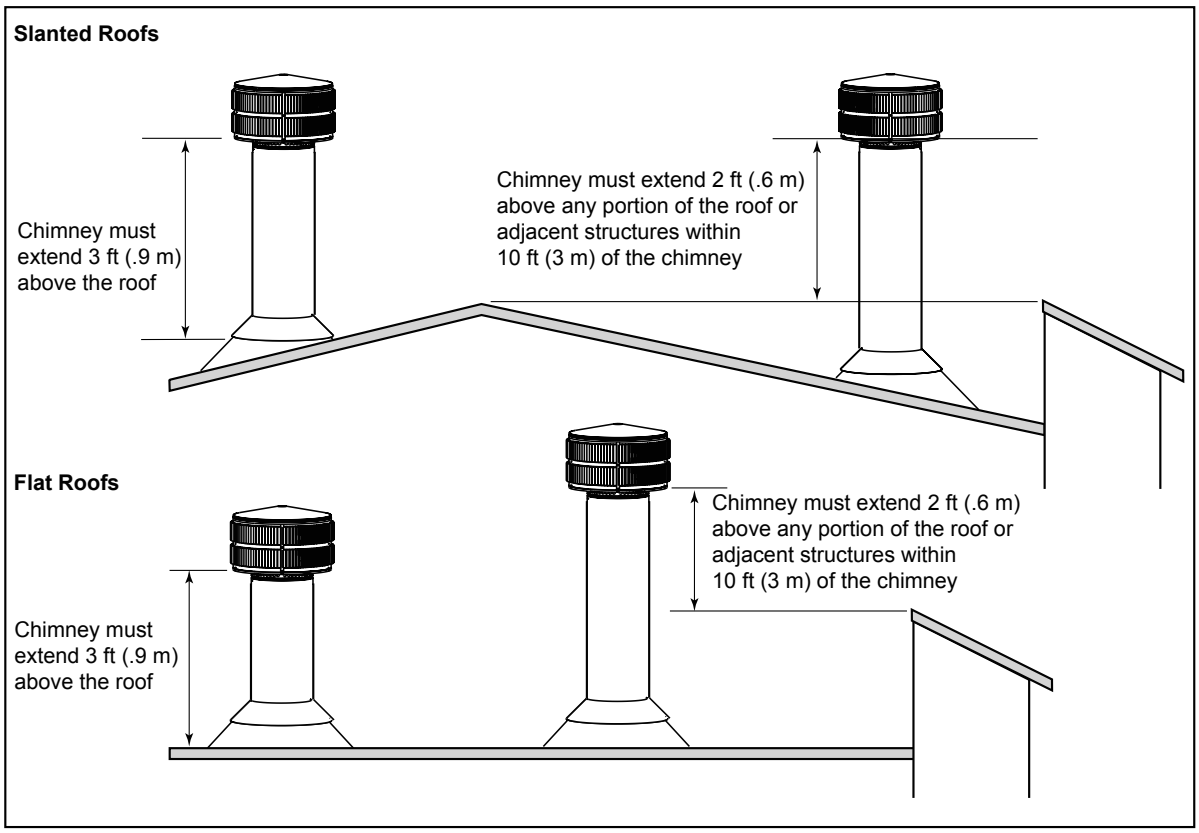


Figure 8.9 Ceiling/Attic Construction

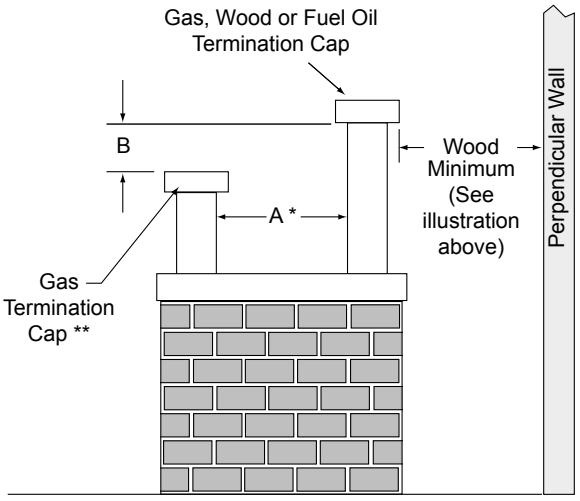
J. Chimney Termination Requirements

- Install a cap approved and listed for this fireplace system.
- Locate cap where it will not become plugged by snow or other materials.
- Locate cap away from trees or other structures.
- The bottom of the termination cap must be at least 3 ft (.91 m) above the roof AND at least 2 ft (.61 m) above any portion of roof within 10 ft (3.05 m) as shown in Figure 8.10.
- The distance required between caps is shown in Figure 8.10.


Slanted Roofs
Chimney must extend 3 ft (.9 m) above the roof
Chimney must extend 2 ft (.6 m) above any portion of the roof or adjacent structures within 10 ft (3 m) of the chimney
Flat Roofs
Chimney must extend 3 ft (.9 m) above the roof
Chimney must extend 2 ft (.6 m) above any portion of the roof or adjacent structures within 10 ft (3 m) of the chimney

Multiple Chimney Locations

A	B
6 in. (minimum) up to 20 in. *152 mm/508 mm*	18 in. minimum *457 mm*
20 in. and over	0 in. minimum



* If using decorative cap cover(s), this distance may need to be increased. Refer to the installation instructions supplied with the decorative cap cover.

** In a staggered installation with both gas and wood terminations, the wood termination cap must be higher than the gas termination cap.

➔ **Figure 8.10 Multiple Chimney Locations**

9 Chase Installations

A. Construct the Chase

A chase is a vertical boxlike structure built to enclose the fireplace and/or its vent system. Vertical chimneys that run on the outside of a building must be installed inside a chase.

Construction of the chase may vary with the type of building. These instructions are not substitutes for the requirements of local building codes. Local building codes MUST be checked.

A chase should be constructed in the manner of all outside walls of the home to prevent cold air drafting problems. The chase should not break the outside building envelope in any manner. All outer walls need to be insulated.

Building codes require false ceiling and ceiling firestops at each floor of the chase or every 10 ft (3.05 m) of clear space to control spread of fire.

Walls, ceiling, base plate and cantilever floor at the first level of the chase should be insulated. See Figure 9.1. Vapor and air infiltration barriers should be installed in the chase as per regional codes for the rest of the home. Additionally, Hearth & Home Technologies recommends that the inside surfaces be sheet rocked and taped (or the use of an equivalent method) for maximum air tightness.

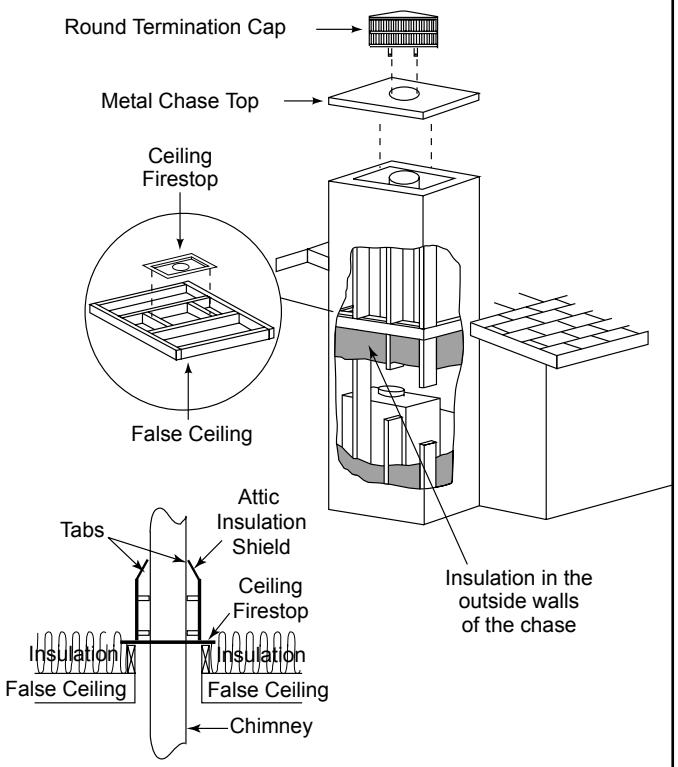


Figure 9.1 Chase Assembly

Gas line holes and other openings should be caulked with high temperature caulk or stuffed with unfaced fiberglass insulation. If the fireplace is being installed on a cement slab, we recommend that in cold climates, a sheet of plywood or other raised platform be placed underneath to prevent conducting cold up into the room.

Three examples of chase applications are shown in Figure 9.2.

1. Fireplace and chimney enclosed in an exterior chase.
2. Chimney offset through exterior wall and enclosed in chase.
3. Chase constructed on roof.

Note: In cooler climates, all chase walls should be insulated.

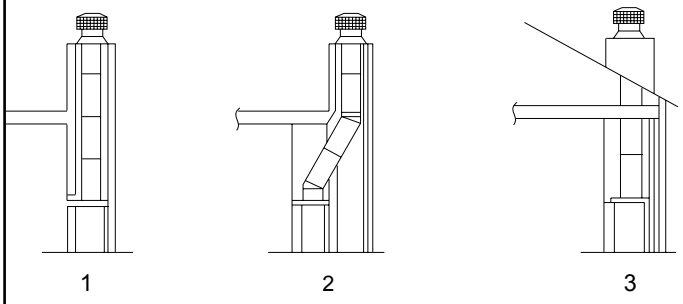


Figure 9.2 Chase Constructions

WARNING! *You must install false ceilings and ceiling firestops at each floor of the chase or every 10 ft (3.05 m) to control spread of fire.*

WARNING! Risk of Fire! DO NOT *seal area between fire stop opening and chimney pipe. Restricting air flow around chimney may cause fire.*

WARNING! Risk of Fire! *You must maintain a minimum 2 in. (51 mm) air space clearance to insulation and other materials surrounding the chimney system.*

- *Insulation and other materials must be firmly secured to prevent accidental contact with chimney system.*
- *The chase must be properly blocked to prevent blown insulation or other combustibles from entering and making contact with fireplace or chimney.*
- *Failure to prevent contact between insulation or other materials and chimney system may cause overheating and fire.*

B. Install Fireplace & Chimney

Install as per Sections 7 and 8.

C. Install Chase Top

- You MUST use a chase top in a chase installation. Chase tops are available from your Heat & Glo dealer or may be field constructed.
- Include a turndown and drip edge to prevent water from seeping into the chase.
- Include a 2 in. (51 mm) soldered, caulked or spun collar around pipe opening to keep water out.
- Provide a 1/8 in. (3 mm) gap around the flue pipe.
- Slope the chase top downward away from the opening.

***CAUTION! DO NOT** caulk the pipe to the chase top collar.*

- Caulk all seams to prevent leaks.
- Refer to Figure 9.4.

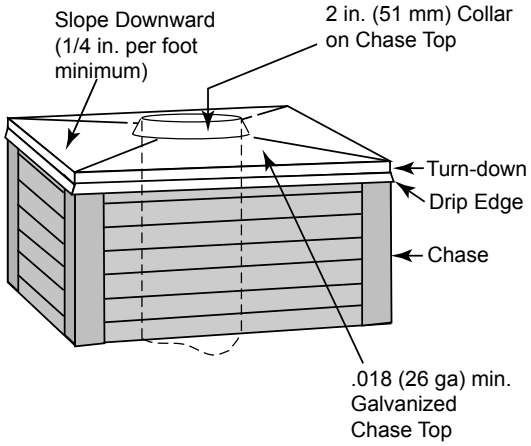


Figure 9.3 Chase Top Construction

D. Install Termination Cap

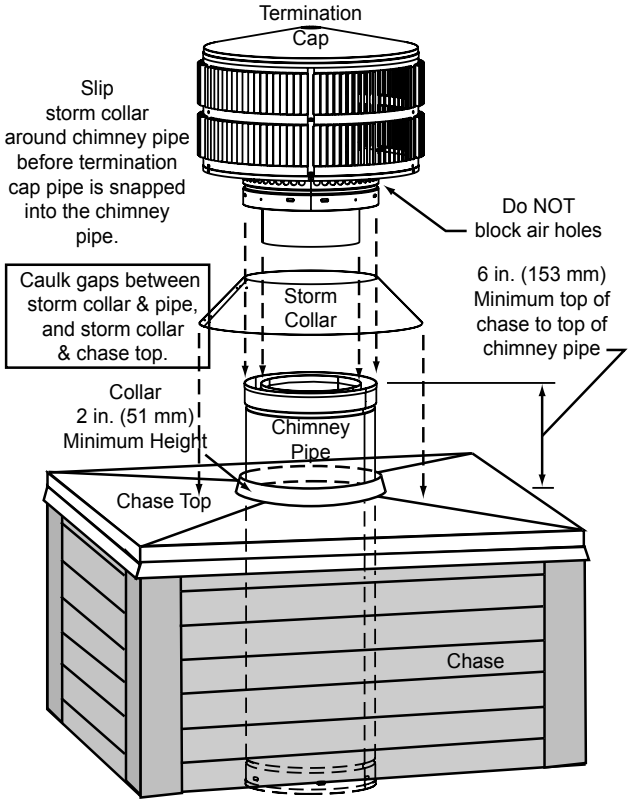
Install the chimney sections up through the chase enclosure.

- Refer to termination cap instructions.

  WARNING! Risk of Fire! *The minimum overlap of cap to pipe (as shown in the following illustrations) MUST be met or chimney may separate from cap. Separation allows sparks, heat and embers to escape.*

  NOTICE: *Paint the termination cap with a rust-resistant paint to protect against the effects of corrosion on those parts exposed to the weather.*

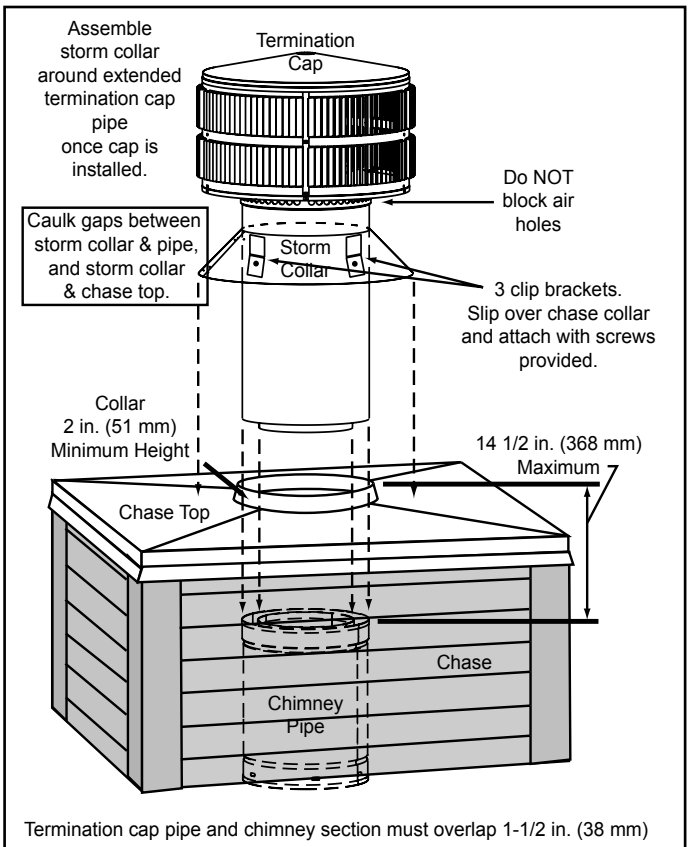
- TR344 Round Termination Cap


Termination Cap
Slip storm collar around chimney pipe before termination cap pipe is snapped into the chimney pipe.
Do NOT block air holes
Caulk gaps between storm collar & pipe, and storm collar & chase top.
Storm Collar
6 in. (153 mm) Minimum top of chase to top of chimney pipe
Collar 2 in. (51 mm) Minimum Height
Chimney Pipe
Chase Top
Chase

Termination cap pipe and chimney section must be snapped together to maintain an overlap of 1-1/2 in. (38 mm).

Figure 9.4 Installing a TR344 Round Termination Cap

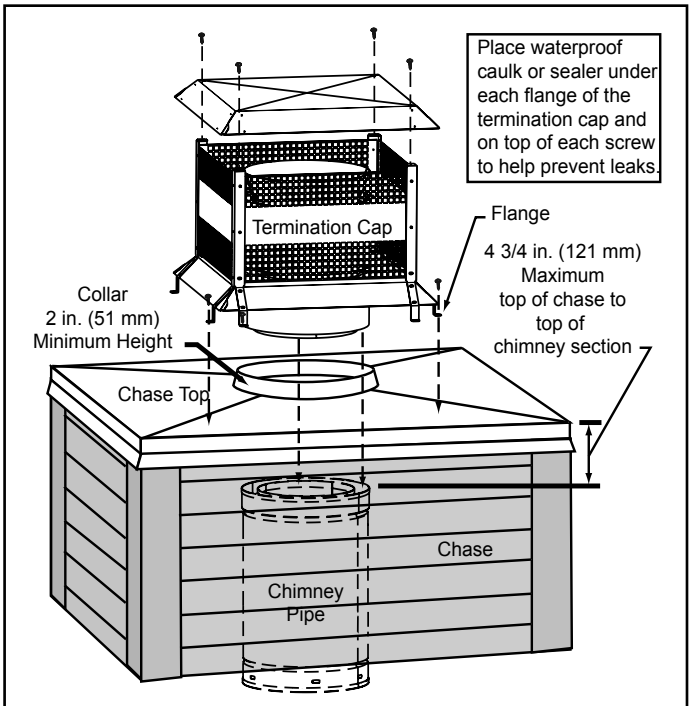
- TR342 Round Telescoping Termination Cap


Assemble storm collar around extended termination cap pipe once cap is installed.
Termination Cap
Do NOT block air holes
Caulk gaps between storm collar & pipe, and storm collar & chase top.
Storm Collar
3 clip brackets. Slip over chase collar and attach with screws provided.
Collar 2 in. (51 mm) Minimum Height
14 1/2 in. (368 mm) Maximum
Chase Top
Chase
Chimney Pipe

Termination cap pipe and chimney section must overlap 1-1/2 in. (38 mm)

Figure 9.5 Installing a TR342 Round Telescoping Termination Cap

- ST375 Square Termination Cap


Place waterproof caulk or sealer under each flange of the termination cap and on top of each screw to help prevent leaks.
Flange
Termination Cap
4 3/4 in. (121 mm) Maximum top of chase to top of chimney section
Collar 2 in. (51 mm) Minimum Height
Chase Top
Chase
Chimney Pipe

Termination cap pipe and chimney section must overlap 1-1/2 in. (38 mm)

Figure 9.6 Installing an ST375 Square Termination Cap

- TS345/TS345P Square Termination Cap

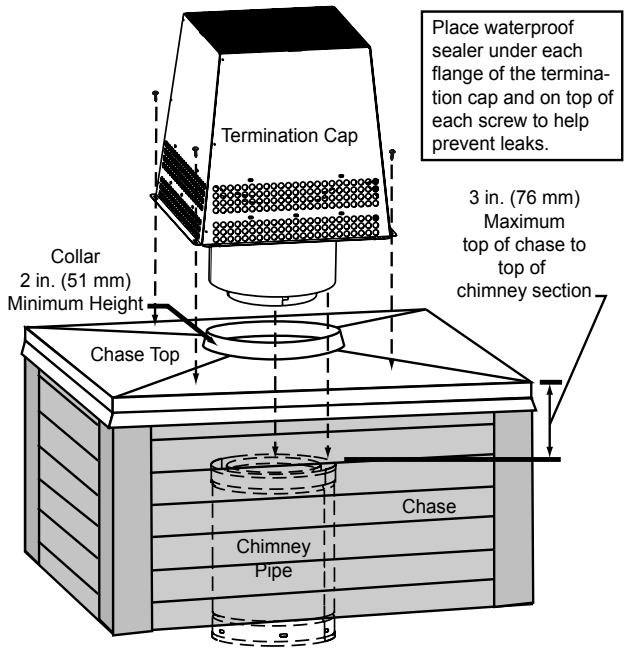

Place waterproof sealer under each flange of the termination cap and on top of each screw to help prevent leaks.
Termination Cap
3 in. (76 mm) Maximum top of chase to top of chimney section
Collar 2 in. (51 mm) Minimum Height
Chase Top
Chase
Chimney Pipe
Termination cap pipe and chimney section must overlap 1-1/2 in. (38 mm).

Figure 9.7 Installing a TS345/TS345P Square Termination Cap

- TCT375 Terra Cotta Cap

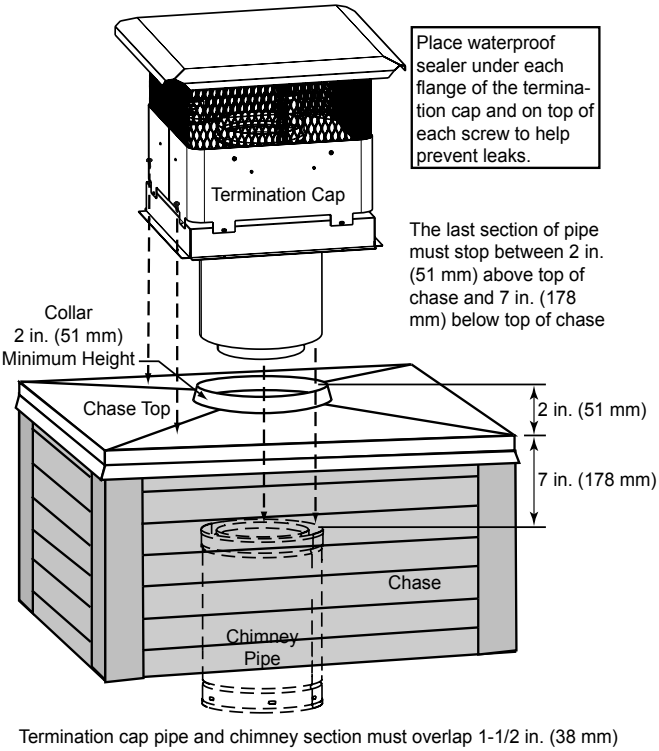

Place waterproof sealer under each flange of the termination cap and on top of each screw to help prevent leaks.
Termination Cap
The last section of pipe must stop between 2 in. (51 mm) above top of chase and 7 in. (178 mm) below top of chase
Collar 2 in. (51 mm) Minimum Height
Chase Top
2 in. (51 mm)
7 in. (178 mm)
Chase
Chimney Pipe
Termination cap pipe and chimney section must overlap 1-1/2 in. (38 mm)

Figure 9.8 Installing a TCT375 Terra Cotta Cap

10 Shrouds

A. Radiation Shield

- Some shrouds require a radiation shield. Use where specified.
- Radiation shield must be constructed of minimum 26 ga sheet metal.

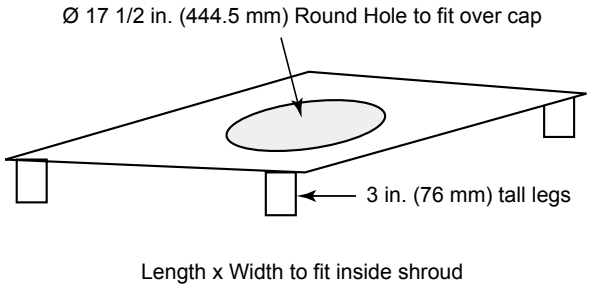


Figure 10.1 Radiation Shield

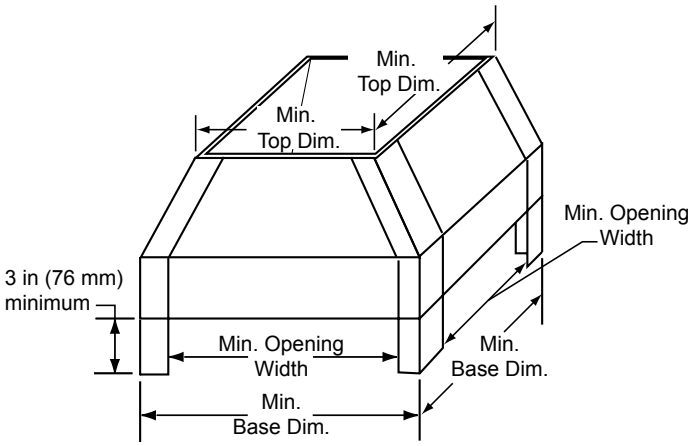
B. Field Constructed Shrouds

WARNING! Risk of Fire! *Shrouds must be constructed as specified. Improper construction may overheat chase top.*

- Chase top shrouds may be field constructed where permitted by regional building codes.

  NOTICE: *Some regional codes require an agency-Listed shroud. Consult your local building officials.*
- Hearth & Home Technologies Inc. supplies UL listed shrouds. See your dealer for details.
- The following field constructed shroud designs have been tested for Hearth Technologies fireplace systems and termination caps.
- The shrouds must be constructed from a minimum .018 in. (26 ga) thick aluminized steel.
- The wire mesh is optional but recommended and must be .018 in. thick minimum, 1/2 in. mesh.

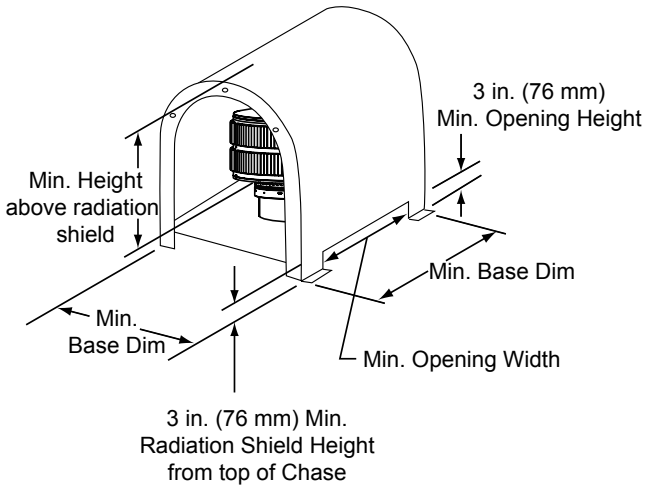
Open Top Shroud (TR342 caps require radiation shield)



	TS345	TR342	TR342/344TV
Min. Base Dims.			
in	23 x 23	28 x 28	26 x 26
mm	584 x 584	711 x 711	660 x 660
		Radiation Shield Required	
Min. Top Dims.			
in	20 x 20	25 x 25	23 x 23
mm	508 x 508	635 x 635	584 x 584
Min. Opening Width			
in	17 x 17	22 x 22	20 x 20
mm	432 x 432	559 x 559	508 x 508

Figure 10.2 Open Top Shroud Dimensions

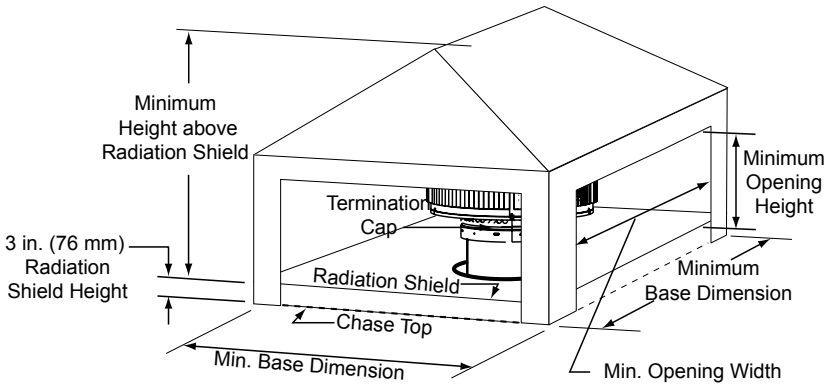
Mailbox Style Shroud (radiation shield required)



	TS345	TR342	TR342/344TV
Min. Base Dims.			
in	N/A	26-1/2 x 28	28 x 30
mm	N/A	673 x 711	711 x 762
Min. Height Above Radiation Shield			
in	N/A	21-1/4	20-1/2
mm	N/A	540	521
Min. Opening Width			
in	N/A	20-1/2 x 22	22 x 24
mm	N/A	521 x 559	559 x 610

Figure 10.3 Mailbox Style Shroud Dimensions

Roofed Style Shroud (radiation shield required)



	TS345/445	TR342/344 TR442/444	TR342/344TV
Min. Base Dims.			
in	N/A	27 x 27	27 x 27
mm	N/A	686 x 686	686 x 686
Min. Height Above Radiation Shield			
in	N/A	16	16
mm	N/A	406	406
Min. Opening Width			
in	N/A	21	21
mm	N/A	533	533
Min. Opening Height			
in	N/A	12	12
mm	N/A	305	305

Figure 10.4 Roofed Style Shroud Dimensions

11 Finishing

A. Non-Combustible Materials

- Materials which will not ignite and burn, composed of any combination of the following:
  - Steel - Iron
  - Brick - Tile
  - Concrete - Slate
  - Glass - Plasters
- Materials reported as passing **ASTM E 136, Standard Test Method for Behavior of Metals, in a Vertical Tube Furnace at 750° C**

B. Combustible Materials

- Materials made of or surfaced with any of the following materials:
  - Wood - Compressed paper
  - Plant fibers - Plastic
- Any material that can ignite and burn; flame proofed or not, plastered or un-plastered

C. Hearth Extension

WARNING! Risk of fire! *High temperatures, sparks, embers or other burning material falling from the fireplace may ignite flooring or concealed combustible surfaces.*

- *Protective metal hearth strips MUST be installed.*
- *Hearth extensions MUST be installed exactly as specified.*

- You MUST use a hearth extension with this fireplace.
- Refer to Figure 11.1 for minimum dimensions.
- This fireplace has been tested and approved for use with a hearth extension insulated to a minimum R value of 1.03.
- The hearth extension material MUST be covered with tile, stone or other non-combustible material.
- Manufactured hearth materials will usually have a published **R value** (resistance to heat) or **k value** (conductivity of heat). Refer to the formula in Table 11.1 to convert a k value to an R value,
- Refer to Table 11.2 for hearth extension insulation alternatives.

Table 11.1

R = 1/k x inches of thickness

Table 11.2

Hearth Extension Insulation Alternatives-Total minimum R Value must equal 1.03

Material	k per inch thick	r per inch thick	Minimum thickness required
Hearth & Home HX3, HX4 (Micore 300™)	0.49	2.06	1/2 in.
USG Micore 160™	0.39	2.54	1/2 in.
USG Durock™ Cement Board	1.92	0.52	2 in.
Cement Mortor	5.0	0.20	5-1/8 in.
Common Brick	5.0	0.20	5-1/8 in.
Ceramic Tile	12.50	0.08	12-1/4 in.
Armstrong™ Privacy Guard Plus	0.46	2.18	1/2 in.
Marble	14.3-20.0	0.07-0.05	14-5/8 in. - 20-3/8 in.

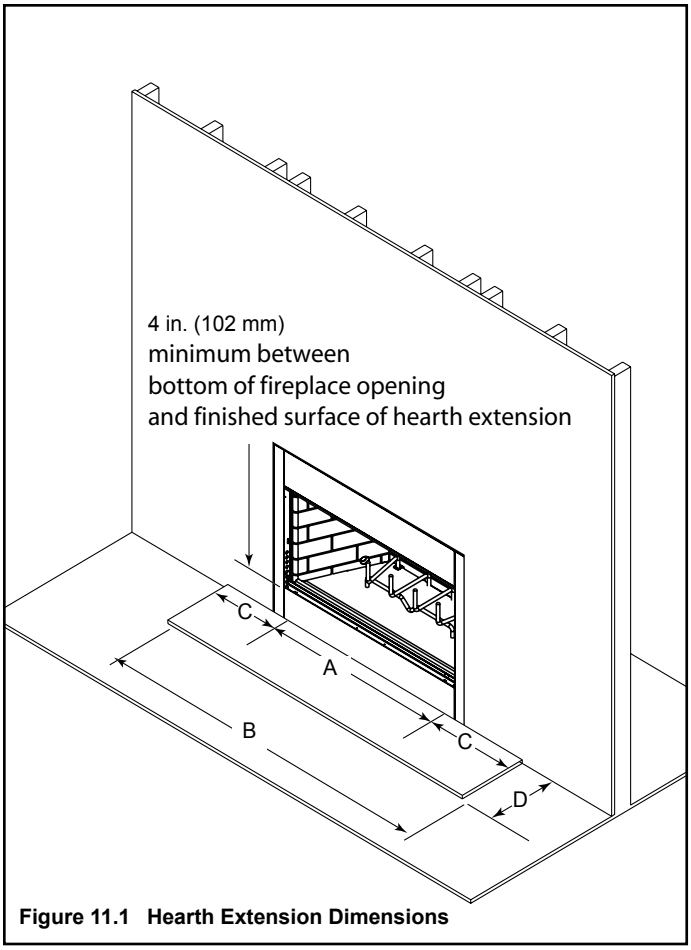


Figure 11.1 Hearth Extension Dimensions

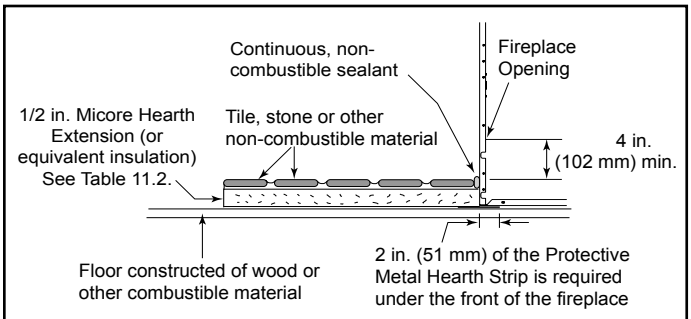

Continuous, non-combustible sealant
Fireplace Opening
1/2 in. Micore Hearth Extension (or equivalent insulation) See Table 11.2.
Tile, stone or other non-combustible material
4 in. (102 mm) min.
Floor constructed of wood or other combustible material
2 in. (51 mm) of the Protective Metal Hearth Strip is required under the front of the fireplace

Figure 11.2 Hearth Extension Construction

Raised Hearth Extension Framing

WARNING! Risk of Fire. *A raised hearth extension built flush with the fireplace opening (Figure 11.3) or less than 4 in. (102 mm) below the fireplace opening requires the fireplace be installed on a non-combustible surface.*

The hearth framing must be constructed of non-combustible materials (Figure 11.2) and placed on 1/2 in. Micore, or equivalent material (Figure 11.4). When creating the platform, allow for the thickness of the non-combustible finishing materials (Figure 11.5).

IMPORTANT! Hearth extension design must be determined before installation of fireplace.

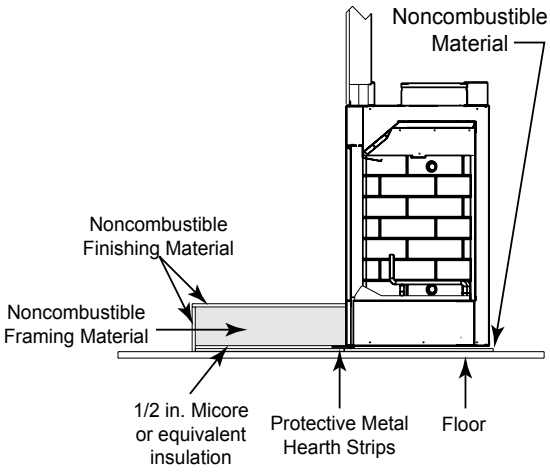


Figure 11.3 Raised Platform Hearth Extension Detail

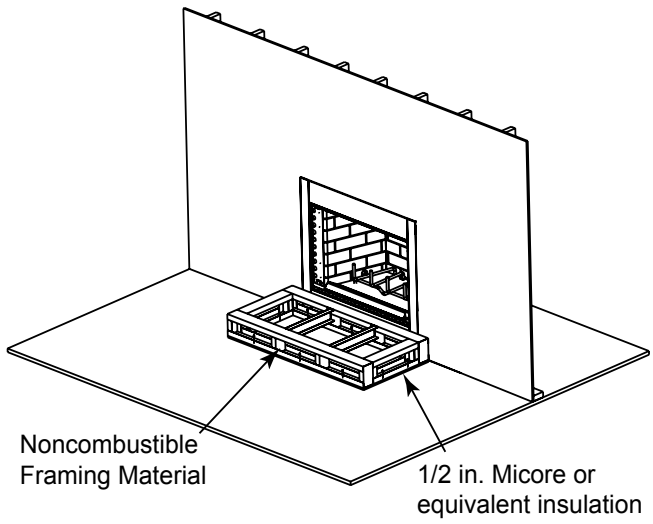


Figure 11.4 Raised Platform Hearth Extension-Framing Materials

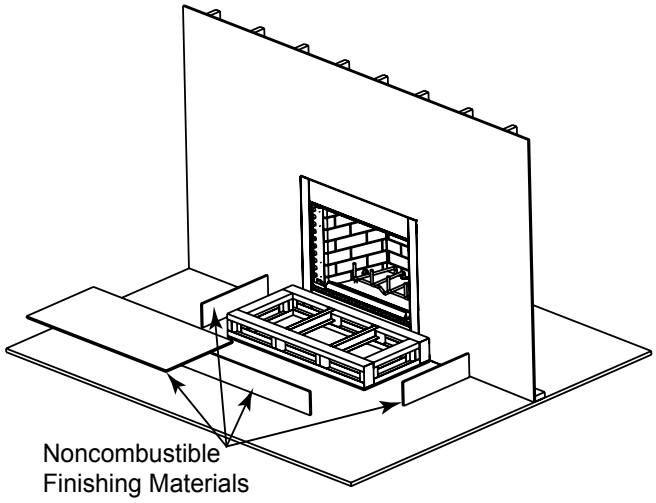


Figure 11.5 Raised Platform Hearth Extension-Finishing Materials

Non-combustible Sealant

After completing the framing and applying the facing materials over the framing, a bead of non-combustible sealant must be used to close off any gaps at the top and sides between the fireplace hearth.

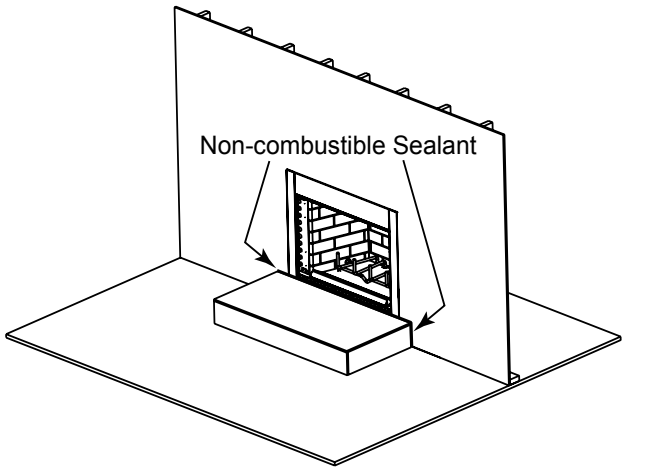


Figure 11.6 Place Non-combustible Sealant

D. Finishing Material

Refer to Sections 11.A. and Sections 11.B. for combustible/noncombustible materials. Refer to Figure 11.7 for noncombustible zone.

WARNING! Risk of Fire! *You must maintain clearances.*

- *Use only non-combustible framing material below standoffs.*
- *Sheetrock, wood or other combustibles must NOT be used as sheathing or facing in the noncombustible zone.*
- ***DO NOT*** *cover metal fireplace front with combustible materials.*
- *Install combustible materials only to specified clearances on top front and side edges.*
- Complete framing and apply facing material (drywall) over framing.
- A bead of 300-deg F minimum non-combustible sealant must be used to close off any gaps at the top and sides between the fireplace and facing to prevent cold air leaks.
- Large gaps can be bridged with fiberglass rope gasket.
- Only non-combustible materials may be used to cover the metal fireplace front.

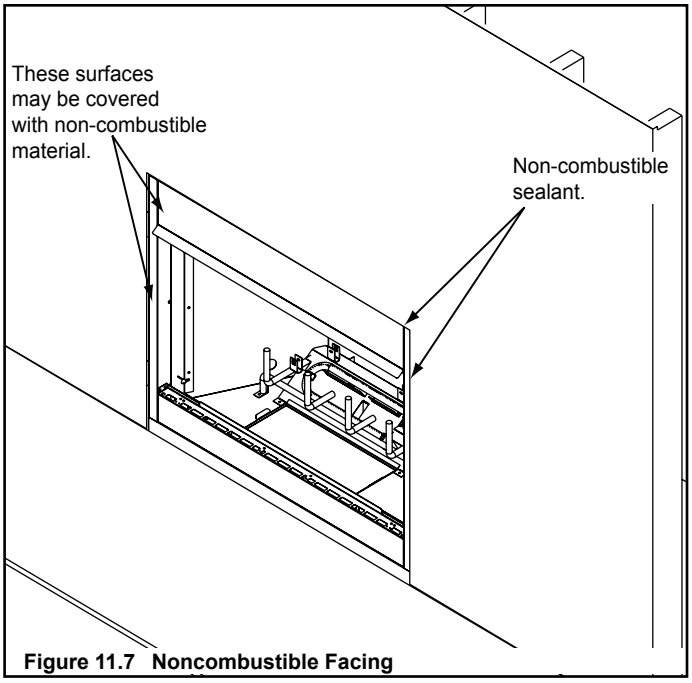


Figure 11.7 Noncombustible Facing

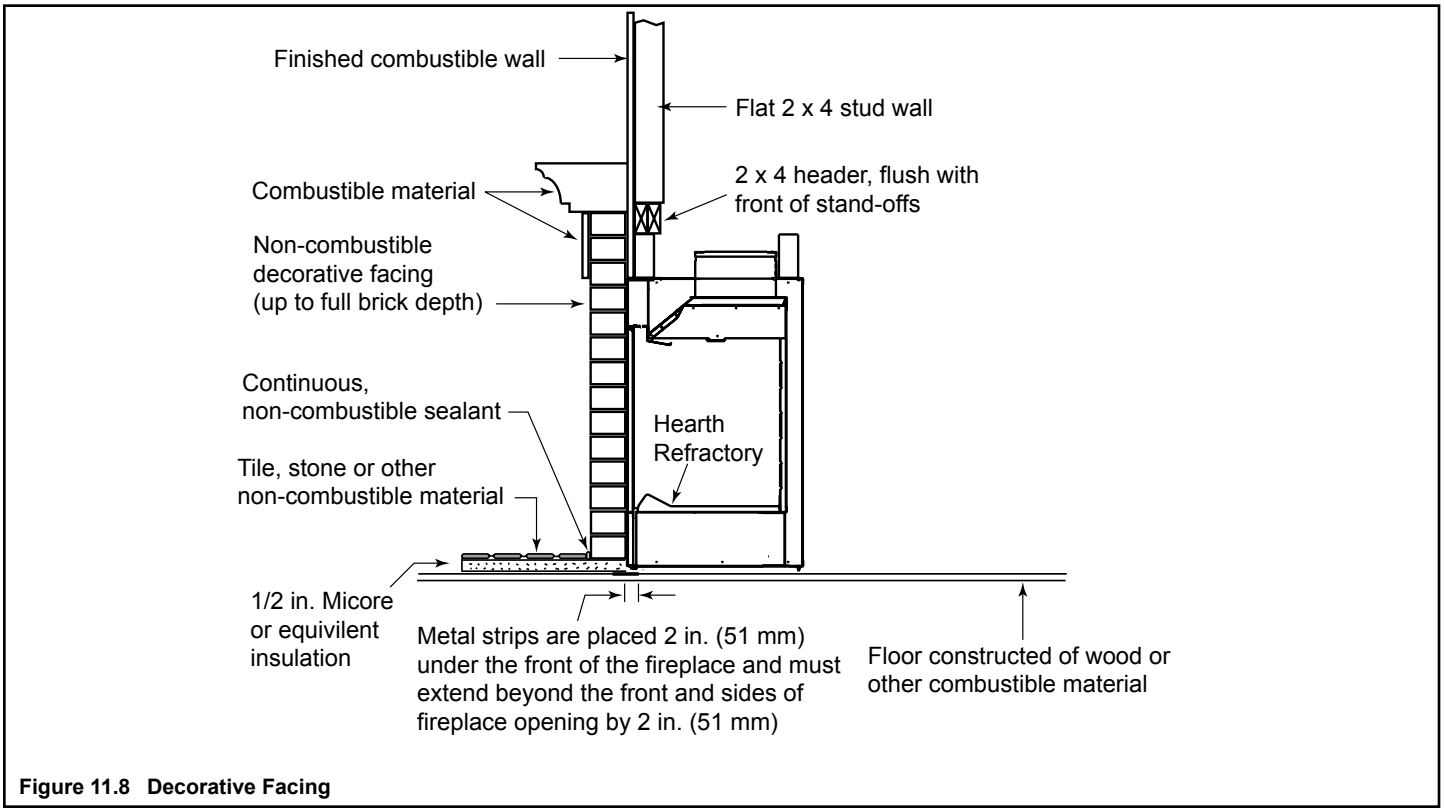
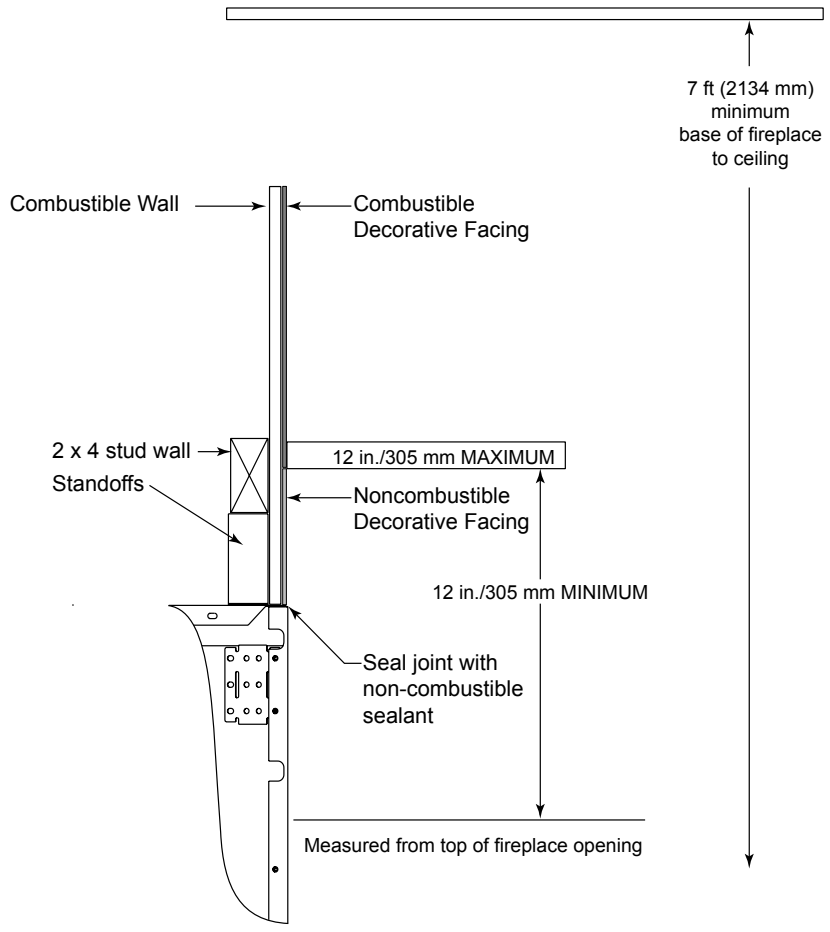


Figure 11.8 Decorative Facing

E. Combustible Mantel

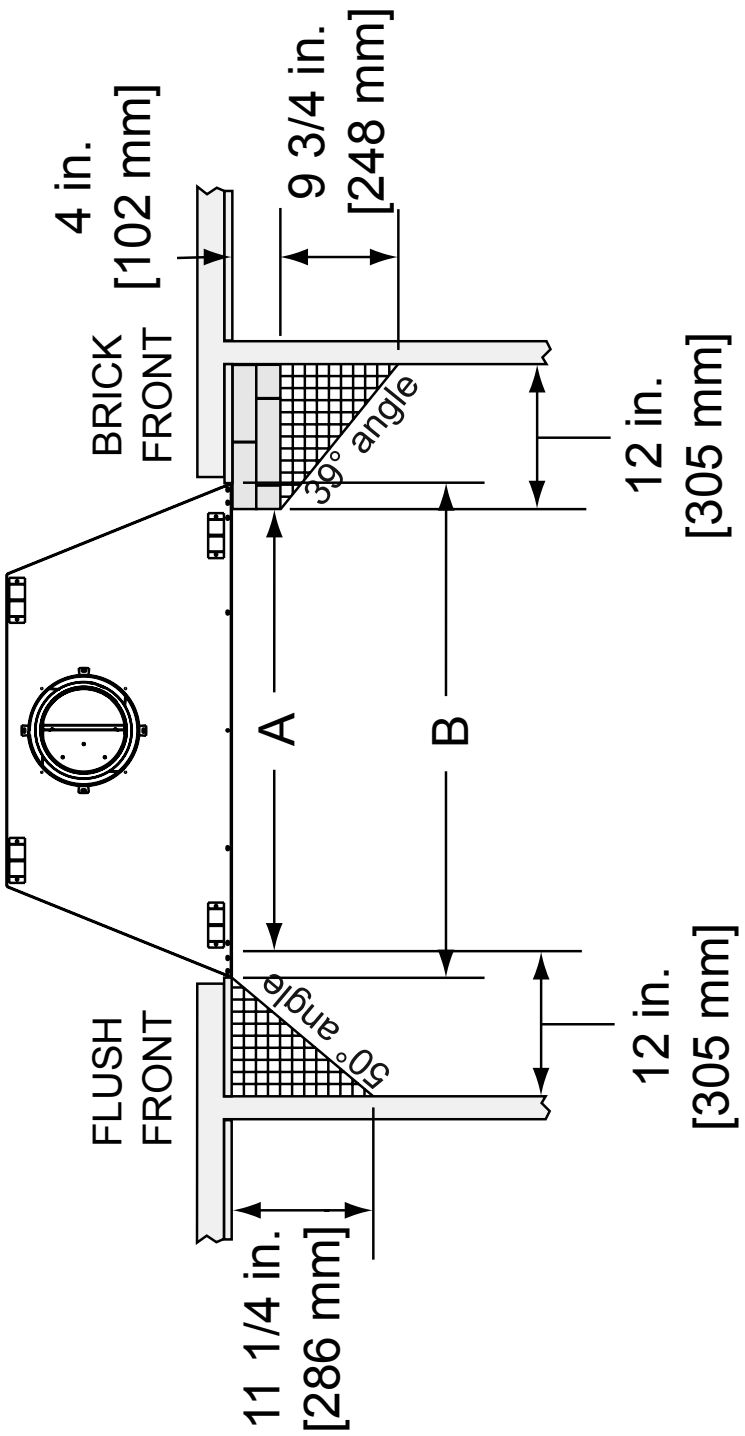
- See Figure 11.9.
- A combustible mantel may be positioned no lower than 12 in. (305 mm) above the top of the fireplace opening.
- A combustible mantel may have a maximum depth of 12 in. (305 mm).
- Combustible trim and materials cannot be placed within 6 in. (152 mm) of the fireplace opening (top or sides).
- Combustible materials projecting more than 1-1/2 in. (38 mm) shall not be placed within 12 in. (305 mm) from the top of the fireplace opening.
- Combustible trim must not cover the metal surfaces of the fireplace.
- Mantel clearance is in accordance with **Section 7-3.3.3** of **ANSI/NFPA211**.



➔ **Figure 11.9 Clearances to Mantels or other Combustibles above Fireplace**

F. Sidewalls/Surrounds

- Adjacent combustible sidewalls must be located a minimum of 12 in. (305 mm) from the fireplace opening.
- Combustible or non-combustible mantel legs, surrounds and stub walls may be constructed per Figure 11.10.



Model #		A Fireplace Opening	B Outside Dimensions
RH-36	*in.*	36	41
	mm	914	1041
RH-42	*in.*	42	47
	mm	1067	1194

Figure 11.10 Mantel Leg or Wall Projections (acceptable on both sides of opening)

12 Accessories

A. Gas Log/Lighter Provision

WARNING! Fire and/or Asphyxiation Risk! *Use with solid wood fuel or decorative gas appliance only. Gas fire generates fumes.*

- ***DO NOT*** *install unvented gas logs*
- *Damper must be locked fully open when gas logs are installed*

A certified gas log lighter or decorative gas log set can be installed in this fireplace.

- Maximum input is 100,000 BTU/hr.
- Decorative gas appliance must be certified to **ANSI Z21.60** "Standard for Decorative Gas Appliances for Installation in Vented Fireplaces".
- Must be installed in accordance with the **National Fuel Gas Code, ANSI Z223.1.**
- A gas log set must incorporate a gas shutoff.
- Gas Log set requires the damper to be locked fully open.
- A listed automatic damper system with safety interlock may be used in this fireplace with only compatible, listed gas log sets. See damper system manufacturer's insturctions.
- Knockouts are provided on both sides of the fireplace and in refractories for 1/2 in. (13 mm) iron pipe.
- Seal refractory around pipe with fireplace mortar or a non-combustible sealant.

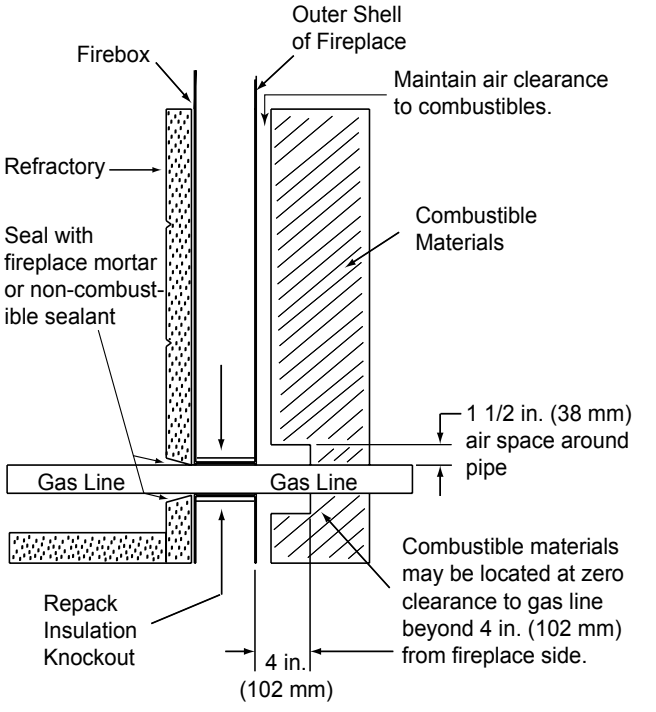

Outer Shell of Fireplace
Firebox
Maintain air clearance to combustibles.
Refractory
Combustible Materials
Seal with fireplace mortar or non-combust-ible sealant
1 1/2 in. (38 mm) air space around pipe
Gas Line
Gas Line
Combustible materials may be located at zero clearance to gas line beyond 4 in. (102 mm) from fireplace side.
Repack Insulation Knockout
4 in. (102 mm)

Figure 12.1 Gas Line Installation

B. Wood Burning Inserts

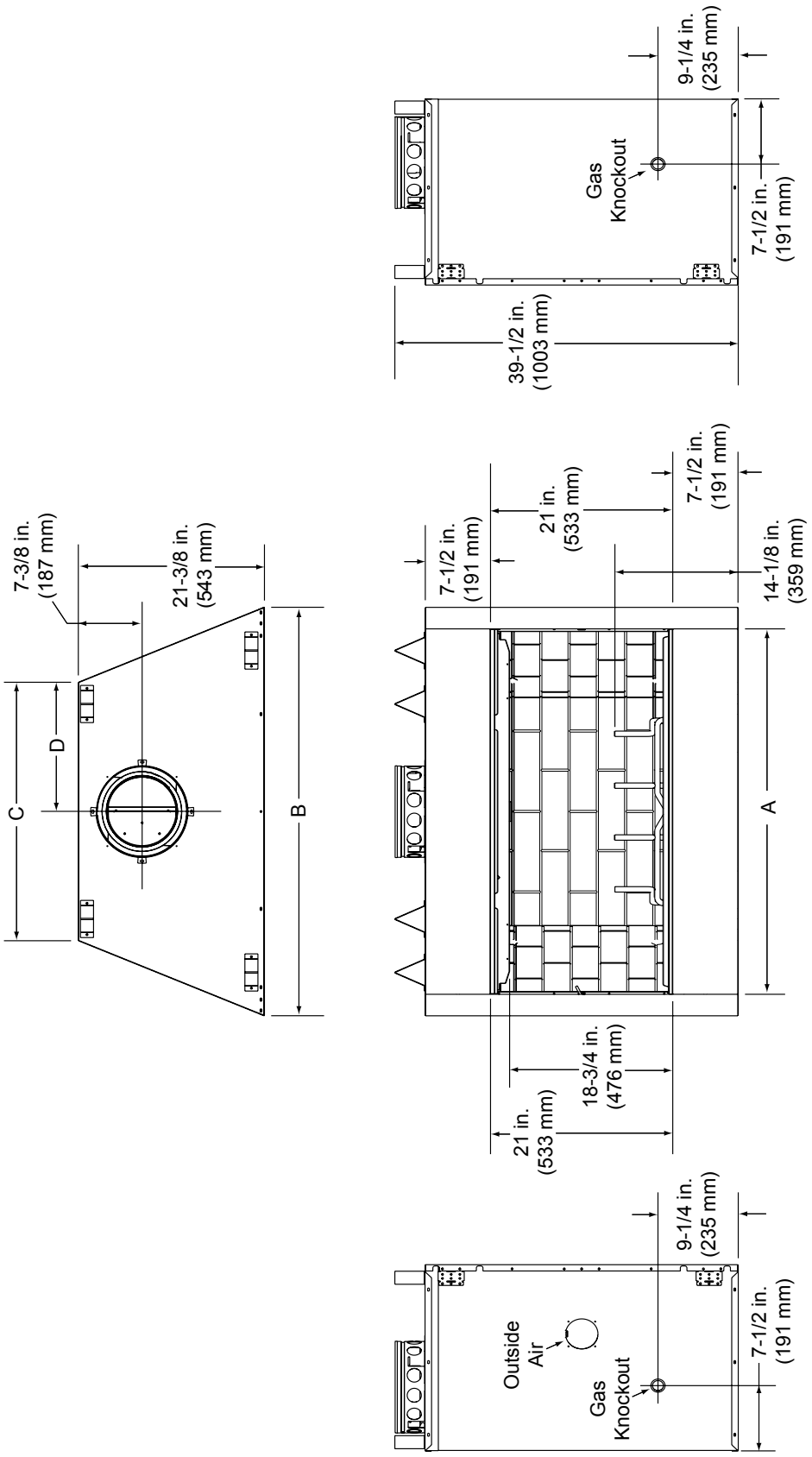
WARNING! Risk of Fire! *Improper installation of wood inserts may cause fireplace or chimney system to overheat.*

If a wood burning insert is being installed in this fireplace, Hearth & Home Technologies recommends full reline of the chimney.

- Cooling air openings at the top of the chimney must not be obstructed in any manner.
- Hearth & Home Technologies recommends securing the reline at the top of the flue and using the cap certified for use with this fireplace system.

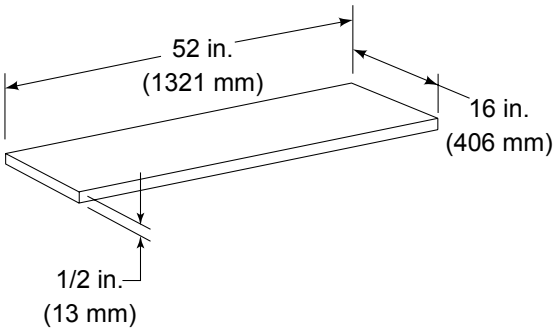
13 Reference Materials

A. Fireplace Dimensions

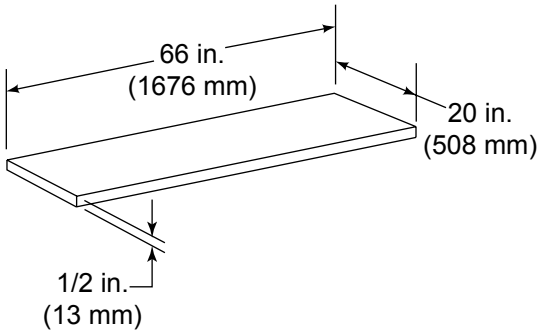


Model #		A	B	C	D
RH-36	*in.*	36	41	23-3/4	11-7/8
	mm	914	1041	603	302
RH-42	*in.*	42	47	29-3/4	14-7/8
	mm	1067	1194	756	378

B. Optional Components

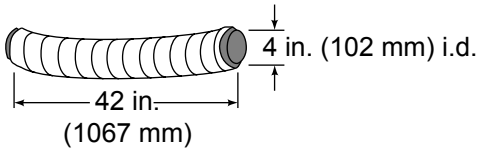


HX3 Hearth Extension

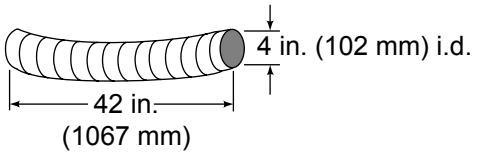


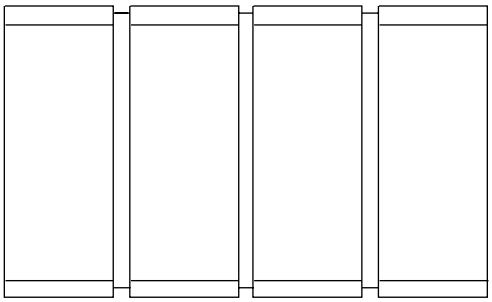
HX4 Hearth Extension

ID4 Insulated Duct



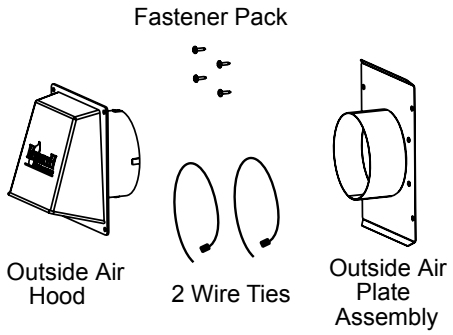
UD4 Uninsulated Duct





Bifold Glass Doors
DM1036, DM1042

4044-036 Air Kit Parts



AK24
Outside Air Kit

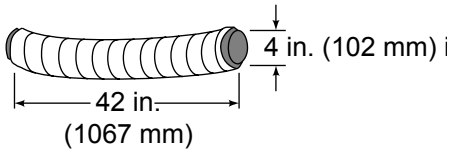
See your Heat & Glo dealer for a complete listing of optional components.

C. Chimney Components

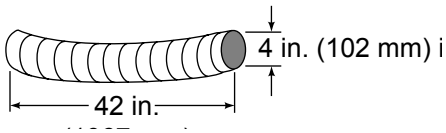
The following pictures show only those chimney components which may be safely used with this fireplace.

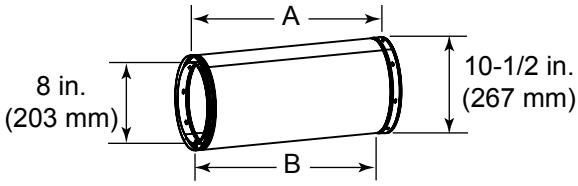
CAK4A	Chimney Air Kit
ID4	Insulated Duct/Outside Air
UD4	Uninsulated Duct/Outside Air
SL306	Chimney Section - 6 in. (152 mm) long
SL312	Chimney Section - 12 in. (305 mm) long
SL318	Chimney Section - 18 in. (457 mm) long
SL324	Chimney Section - 24 in. (610 mm) long
SL336	Chimney Section - 36 in. (914 mm) long
SL348	Chimney Section - 48 in. (1219 mm) long
SL3	Chimney Stabilizer
SL315	Chimney Offset/Return - 15 deg
SL330	Chimney Offset/Return - 30 deg
FS338	Ceiling Firestop - Straight
FS339	Ceiling Firestop - 15 deg
FS340	Ceiling Firestop - 30 deg
AS8	SL300 Straight Attic Insulation Shield, 24 in. (610 mm)
JB877	Chimney Joint Band
CB876	Chimney Bracket
RF370	Roof Flashing - Flat to 6/12 Pitch
RF371	Roof Flashing - 6/12 to 12/12 Pitch
TR344	Round Termination Cap
TR342	Round Telescoping Termination Cap
ST375	Square Termination Cap
TS345	Square Termination Cap
TS345P	Square Termination Cap - Painted
TCT375	Terra Cotta Termination Cap
CT35	Chase Top
LDS33	Decorative Shroud - 3 ft x 3 ft (.91 m x .91 m)
LDS46	Decorative Shroud - 4 ft x 6 ft (1.22 m x 1.83 m)
LDS-BV	Decorative Shroud - 26 in. x 26 in. (660 mm x 660 mm)
	Field Constructed Shrouds (See “Woodburning Termination Cap”)
CT-3A	Adapter - May be used with the following copper caps
	CT-King
	CT-Queen
	CT-Bishop-I
	CT-Bishop-II
	CT-Knight-I
	CT-Pawn

ID4 Insulated Duct



UD4 Uninsulated Duct

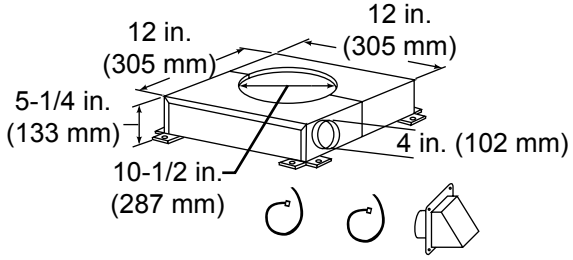




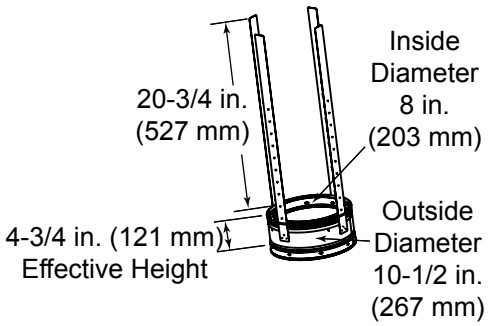
Chimney Sections

Catalog #	A		B	
	in	mm	in	mm
SL306	6	152	4-3/4	121
SL312	12	305	10-3/4	273
SL318	18	457	16-3/4	425
SL324	24	610	22-3/4	578
SL336	36	914	34-3/4	883
SL348	48	1219	46-3/4	1187

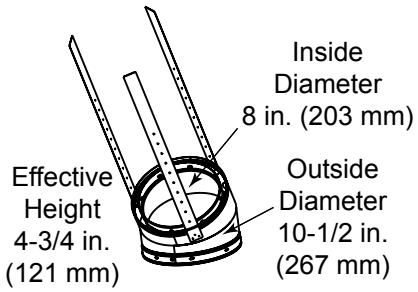
A = Actual Length
B = Effective Length (length of chimney part after it has been snapped to another)



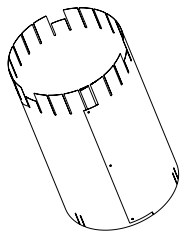
CAK4A Chimney Air Kit



SL3 Vent Stabilizer

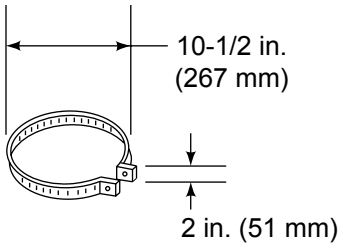


SL315/SL330 Offset/Return

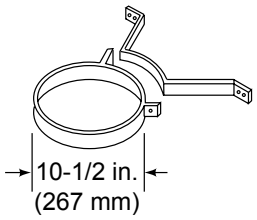


Assembled
Diameter: 14 1/2 in./368 mm
Height: 24 in./610 mm

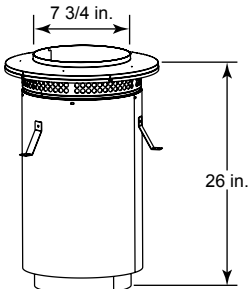
AS8 Straight Attic Insulation Shield



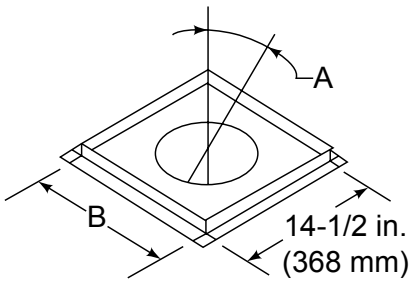
JB877 Chimney Joint Band



CB876 Chimney Joint Band

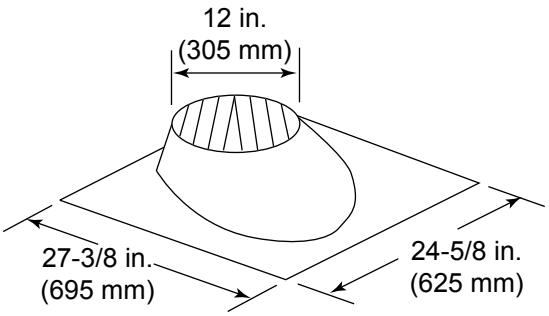


CT-3A

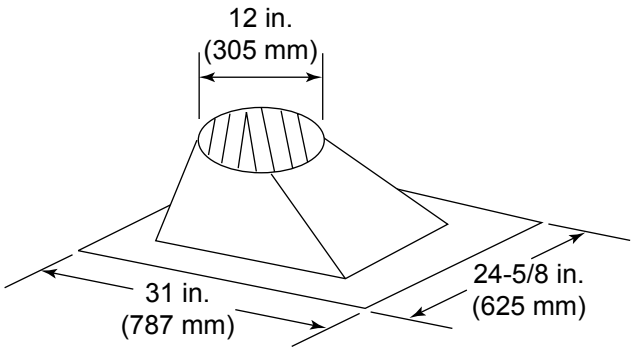


Ceiling Firestop

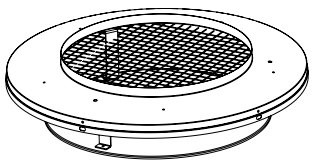
Catalog #	A	B	
FS338	0-deg.	14-1/2 in.	368 mm
FS339	15-deg.	18-3/8 in.	467 mm
FS340	30-deg.	23 in.	584 mm



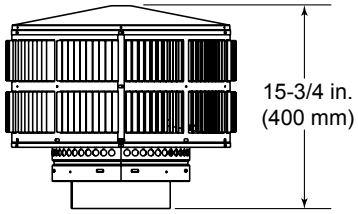
RF370 Roof Flashing



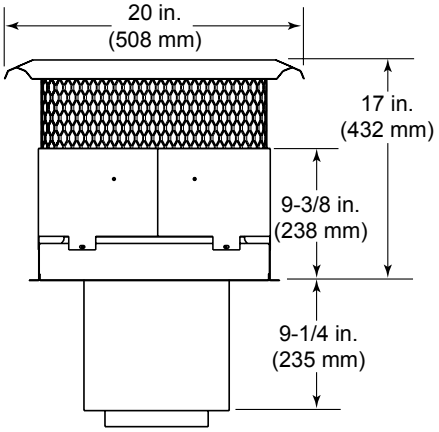
RF371 Roof Flashing



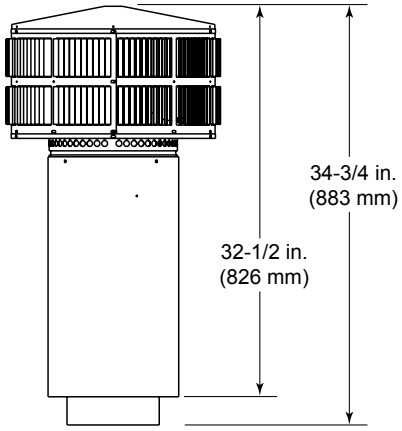
TR-TVK
TR Top Vent Kit



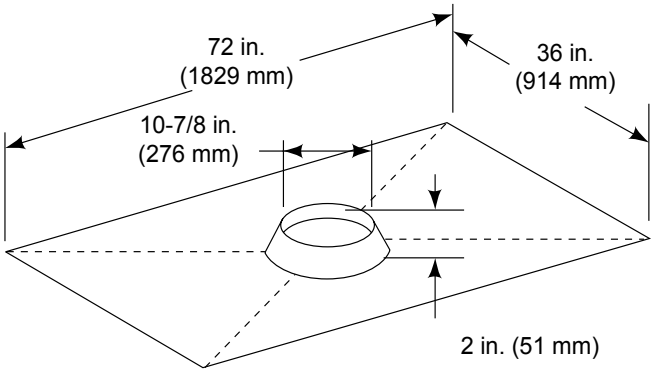
TR344 Round Termination Cap



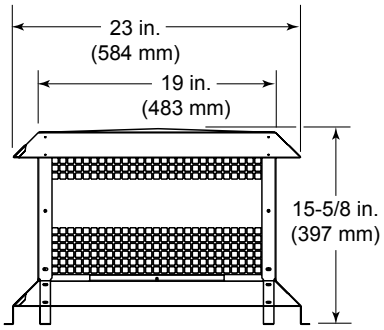
TCT375 Terra Cotta Cap



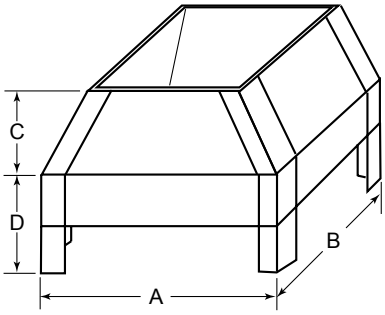
TR342 Round Telescoping Termination Cap



CT35 Chase Top

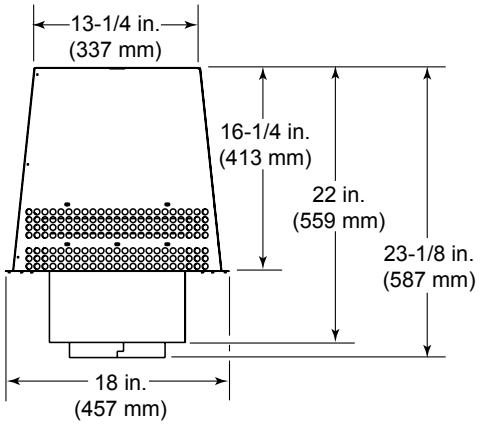


ST375 Square Termination Cap

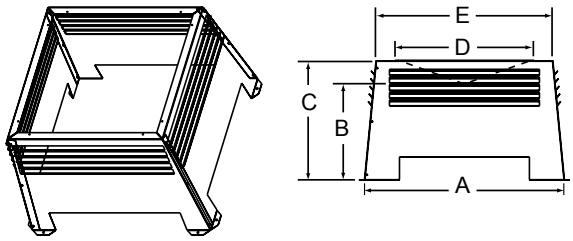


LDS33/LDS46 Decorative Shroud

Catalog #	A		B		C		D	
	in.	*mm*	*in.*	*mm*	*in.*	*mm*	*in.*	*mm*
LDS33	*36*	*914*	*36*	*914*	*8-1/2*	*216*	*11*	*279*
LDS46	*48*	*1219*	*72*	*1829*	*8-1/2*	*216*	*11*	*279*

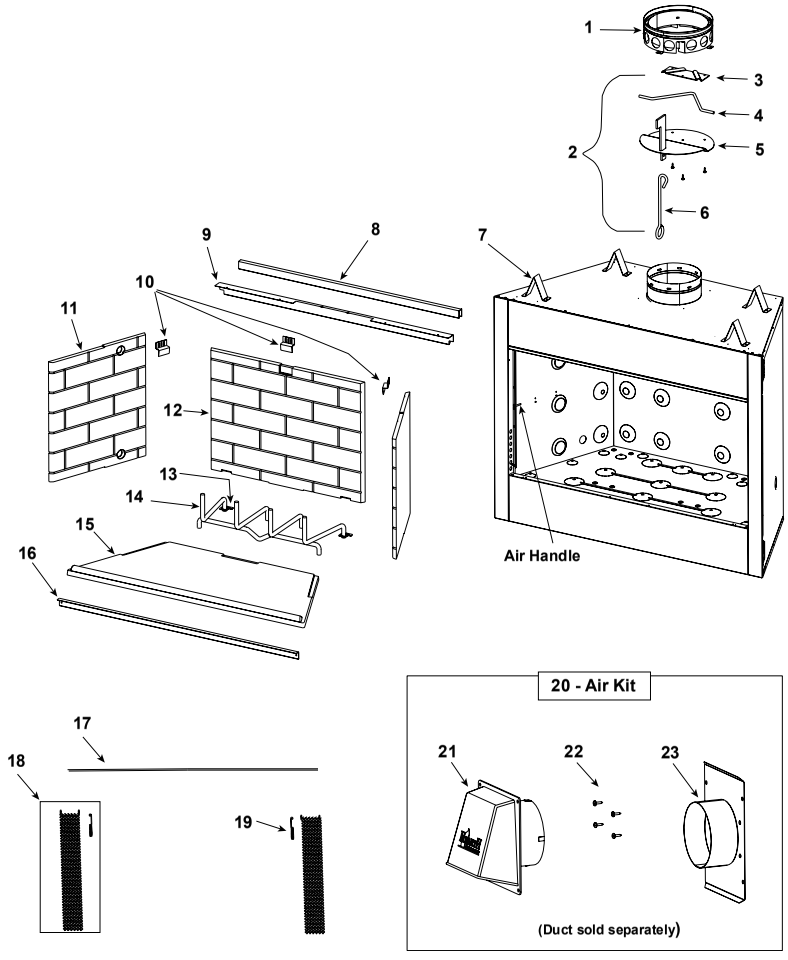


TS345/TS345P Square Termination Cap



LDS-BV Decorative Shroud

Catalog #		A	B	C	D	E
LDS-BV	*in.*	*26*	*12-1/2*	*15-1/2*	*22*	*23*
	mm	*660*	*318*	*394*	*533*	*584*



Part number list on following page.

HEAT&GLO
No one builds a better fire

Service Parts

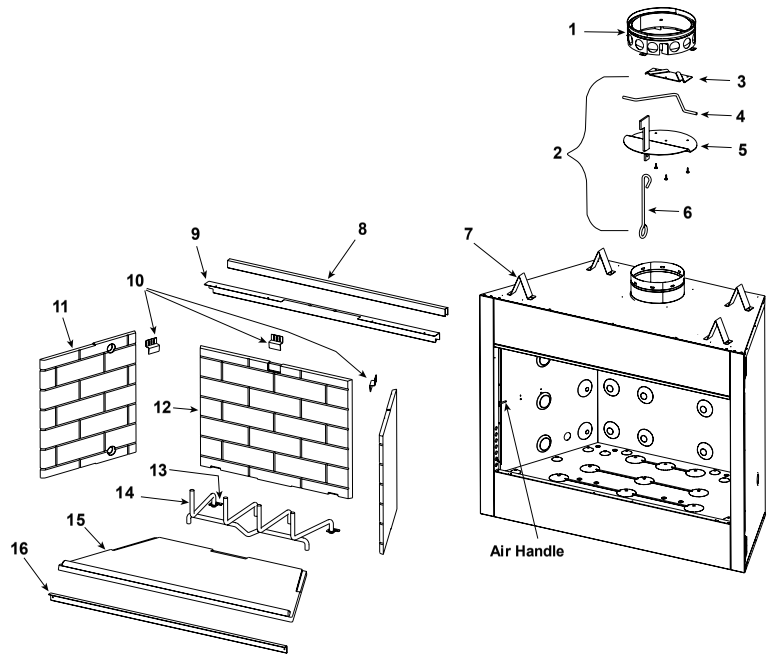
RH-36

Service Parts Diagram
Royal Hearth Woodburning Fireplace

Beginning Manufacturing Date: Jan. 2005
Ending Manufacturing Date: Active

IMPORTANT: THIS IS DATED INFORMATION. When requesting service or replacement parts for your appliance please provide model number and serial number. All parts listed in this manual may be ordered from an authorized dealer.

ITEM	DESCRIPTION	COMMENTS	PART NUMBER	Stocked at Depot
1	Starter Section Assembly		22069B	Y
2	Damper Kit		4044-029	Y
3	Damper Weight		19785A	N
4	Damper Rod		28900	N
5	Damper Blade Assembly		4044-030	N
6	Damper Control		4044-152	N
7	Top Standoff	Qty. 4 req	4044-111	N
8	Door Track (used for upper)		15425	N
9	Smoke Shield	1 ea.	4044-131	N
10	Refractory Retainer	Qty. 3 req	11847	N
11	Side Refractory	Qty. 2 req	4044-114	N
12	Back Refractory		4044-130	N
13	Grate Retainer	Qty. 2 req	4044-170	N
14	Grate		GR41	Y
15	Hearth Refractory		4044-129	N
16	Hearth Retainer		4044-128	N
17	Firescreen Assembly	Qty. 2 req	4044-028	Y
18	Firescreen Rod	1 ea.	4044-175	N
19	Firescreen Handle	1 ea.	10002	N
20	Outside Air Replacement Kit		4044-036	Y
21	Outside Air Shield		33271	Y
22	Fastener Pack		12010B	N
23	Outside Air Plate Assembly		4044-031	N
	Door Pivot Clip	Qty. 2 req	31527	N
	Extended Smoke Shield Kit	Qty. 2 req	SRV4044-038	N
	Fastener Pack	2 ea.	12010B	N
	Smoke Shield Kit Installation Instructions		4044-165	N
	Hair Pin Clip	Qty. 2 req	101025	Y
	Nailing Flange	Qty. 4 req	4044-161	N
	Smoke Baffle	Qty. 2 req	4044-116	N
	Strip Protector	Qty. 2 req	18320	N
	Installation Instructions and Owner's Manual		4044-153	N



Part number list on following page.

06/08

HEAT&GLO
No one builds a better fire
Service Parts
RH-42
Service Parts Diagram
Royal Hearth Woodburning Fireplace
Beginning Manufacturing Date: Jan. 2005
Ending Manufacturing Date: Active

IMPORTANT: THIS IS DATED INFORMATION. When requesting service or replacement parts for your appliance please provide model number and serial number. All parts listed in this manual may be ordered from an authorized dealer.

ITEM	DESCRIPTION	COMMENTS	PART NUMBER	Stocked at Depot
1	Starter Section Assembly		22069B	Y
2	Damper Kit		4044-029	Y
3	Damper Weight		19785A	N
4	Damper Rod		28900	N
5	Damper Blade Assembly		4044-030	N
6	Damper Control		4044-152	N
7	Top Standoff	Qty. 4 req	4044-111	N
8	Door Track (used for upper)		15427	N
9	Smoke Shield	1 ea.	4044-120	N
10	Refractory Retainer	Qty. 3 req	11847	N
11	Side Refractory	Qty. 2 req	4044-114	N
12	Back Refractory		4044-113	N
13	Grate Retainer	Qty. 2 req	4044-170	N
14	Grate		GR40	Y
15	Hearth Refractory		4044-112	N
16	Hearth Retainer		4044-109	N
17	Firescreen Assembly	Qty. 2 req	4044-027	Y
18	Firescreen Rod	1 ea.	4044-172	N
19	Firescreen Handle	1 ea.	10002	N
20	Outside Air Replacement Kit		4044-036	Y
21	Outside Air Shield		33271	Y
22	Fastener Pack		12010B	N
23	Outside Air Plate Assembly		4044-031	N
	Door Pivot Clip	Qty. 2 req	31527	N
	Extended Smoke Shield Kit	Qty. 2 req	SRV4044-037	N
	Fastener Pack	2 ea.	12010B	N
	Smoke Shield Kit Installation Instructions		4044-165	N
	Hair Pin Clip	Qty. 2 req	101025	Y
	Nailing Flange	Qty. 4 req	4044-161	N
	Smoke Baffle	Qty. 2 req	4044-116	N
	Strip Protector	Qty. 2 req	18320	N
	Installation Instructions and Owner's Manual		4044-153	N

06/08

E. Contact Information

HEAT & GLO™

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Please contact your Heat & Glo dealer with any questions or concerns.

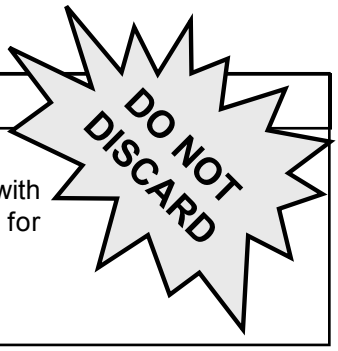
For the number of your nearest Heat & Glo dealer, please visit www.heatnglo.com.

– NOTES –

CAUTION

DO NOT DISCARD THIS MANUAL

- Important operating and maintenance instructions included.
- Read, understand and follow these instructions for safe installation and operation.
- Leave this manual with party responsible for use and operation.



This product may be covered by one or more of the following patents: (United States) 4593510, 4686807, 4766876, 4793322, 4811534, 5000162, 5016609, 5076254, 5113843, 5191877, 5218953, 5263471, 5328356, 5341794, 5347983, 5429495, 5452708, 5542407, 5601073, 5613487, 5647340, 5688568, 5762062, 5775408, 5890485, 5931661, 5941237, 5947112, 5996575, 6006743, 6019099, 6048195, 6053165, 6145502, 6170481, 6237588, 6296474, 6374822, 6413079, 6439226, 6484712, 6543698, 6550687, 6601579, 6672860, 6688302B2, 6715724B2, 6729551, 6736133, 6748940, 6748942, 6769426, 6774802, 6796302, 6840261, 6848441, 6863064, 6866205, 6869278, 6875012, 6880275, 6908039, 6919884, D320652, D445174, D462436; (Canada) 1297749, 2195264, 2225408, 2313972; (Australia) 780250, 780403, 1418504 or other U.S. and foreign patents pending.